Astronomisches Jahrbuch

für

1902.

Der Sammlung Berliner astronomischer Jahrbücher
einhundert und siebenundzwanzigster Band.



Berliner

Astronomisches Jahrbuch

für

1902

mit Angaben für die Oppositionen
der Planeten (1)—(440)

für

1900.

Herausgegeben

von dem

Königlichen Astronomischen Rechen-Institut

unter Leitung von

J. Bauschinger.

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Mitarbeiter: Dr. P. Neugebauer, Professor.

Inhalt.

Anhänge.

Berichtigungen.

Jahrbuch 1899.

Seite 171 ♃ Länge i. d. Bahn Dec. 15 lies: 233° 14′ 53″.1
anstatt: 233 4 53 .1

Jahrbuch 1901.

Seite 84—86 Die Ephemeride des Kraters Mösting A für 1901 ist von Juli 23 ab fehlerhaft; die berichtigte Ephemeride befindet sich im Anhang II des vorliegenden Jahrgangs 1902.

Seite 251 λ Draconis Decl. lies: 73″.3 73″.5 74″.3 75″.7 77″.5 79″.8
82″.4 85″.2 88″.2 91″.1 93″.8 96″.3 98″.5 100″.3
101″.6 102″.4 102″.7 102″.4 101″.6 100″.4 98″.6 96″.5
94″.0 91″.1 88″.0 84″.7 80″.8 77″.3 73″.7 70″.2
66″.9 63″.8 61″.0 58″.6 56″.8 55″.5 54″.8 54″.6
Für 1900 ist die Decl. in demselben Betrage zu corrigiren.

Seite 258 α Virginis Decl. Nov. 6 — Dec. 36 lies: 51″.3 52″.2 53″.4 54″.8
56″.5 58″.4 60″.3

Seite 306 γ Cephei Decl. lies: 72″.1 71″.2 69″.8 67″.8 65″.4 62″.6 59″.6
56″.4 53″.0 50″.1 47″.4 45″.1 43″.2 41″.8 41″.0 40″.8
41″.2 42″.1 43″.5 45″.5 47″.9 50″.7 53″.9 57″.3 60″.9
64″.6 68″.3 72″.1 75″.7 79″.0 82″.2 84″.9 87″.3 89″.1
90″.4 91″.1 91″.2 90″.6

Seite 309 Nr. 429 log. b' lies: 9.5543_n anstatt: 9.5533_n

Seite 346 Nr. 34 ν Scorpii Decl. lies: —19° 12′ 12″.8
anstatt —19 14 12 .8
hiernach erhält der Werth q für diesen Stern in den Elementen der Bedeckungen die Correction: —0.0367

Jahrbuch 1902.

Seite 412 Die Angaben für (423) [1896 *DB*] Juli 13 sind durch folgende zu ersetzen:

423 [1896 *DB*]	Juli 25	11.0	20ʰ 14ᵐ.7	—33° 12′	0ᵐ.9	—4	0.291	1899

Vorwort.

Nach den Beschlüssen der Pariser Conferenz vom Mai 1896 *(Conférence internationale des étoiles fondamentales. Procès-Verbaux. Paris 1896)* sind im Jahrbuch vom Jahrgang 1901 an durchweg eingeführt:

die Praecessions-Gröſsen nach S. Newcomb *(Astr. Papers Vol. VIII. Part I)*,
die Nutations-Constante 9″.21,
die Aberrations-Constante 20″.47,
die Sonnen-Parallaxe 8″.80;

ferner sind in allen Ephemeriden der Sonne, der Planeten und der Fixsterne die kurzperiodischen, von der Mondlänge abhängigen Nutations-Glieder weggelassen; ausgenommen von dieser allgemeinen Regel sind nur die Ephemeriden der Polsterne, die von Tag zu Tag fortschreiten; in diesen ist wohl das allen Sternen gemeinsame Nutations-Glied $f' = -0''.1865 \sin 2☾ + 0''.0618 \sin(☾ - \Gamma')$ weggelassen, die übrigen mit der Tangente der Decl. multiplicirten Glieder sind jedoch beibehalten. Das Jahrbuch giebt übrigens die Mittel an die Hand, die weggelassenen Glieder nachträglich anzubringen, worüber die »Erläuterungen« einzusehen sind.

Am Fundamental-Katalog der Fixsterne sind keine Aenderungen vorgenommen worden, den angegebenen Eigenbewegungen liegt also nach wie vor die O. Struve'sche Praecessions-Constante zu Grunde. Im Anhang I. sind diejenigen provisorischen Correctionen der mittleren Oerter zusammengestellt, welche A. Auwers in A. N. Nr. 3508/09 angegeben hat. Die scheinbaren Oerter der Fixsterne sind mit obigen neuen Constanten gerechnet.

Für die Planeten sind folgende Tafeln benutzt worden:

Sonne: Tafeln von Newcomb,
Mercur: Tafeln von Newcomb,
Venus: Tafeln von Newcomb,
Mars: Tafeln von Newcomb,
Jupiter: Tafeln von Hill,
Saturn: Tafeln von Hill,
Uranus: Tafeln von Newcomb,
Neptun: Tafeln von Newcomb.

Die Schiefe der Ekliptik ist nach Newcomb angenommen.

Für den Halbmesser der Sonne ist die bisherige Constante (nach Auwers) beibehalten, für den Halbmesser des Mondes ist sowohl in der Ephemeride (S. 42–81) als bei der Berechnung der Finsternisse und Stern-Bedeckungen der von J. Peters ermittelte Werth benutzt (A. N. Nr. 3297).

Die Lage des Mond-Aequators ist nach J. Franz (A. N. Nr. 3241) angenommen.

Als Vergröfserungsfactor für den Erdschatten bei Mond-Finsternissen ist nach J. Hartmann $\frac{1}{50}$ angenommen worden.

Den Hülfstafeln ist eine Tafel zur Verwandlung der Decimaltheile des Tages in Stunden, Minuten, Secunden und umgekehrt hinzugefügt worden.

Zeit- und Festrechnung 1902.

Das Jahr 1902 entspricht dem
Jahr 6615 der Julianischen Periode und dem
Jahr 7410 — 7411 der Byzantinischen Aere.

	Gregorianischer oder Neuer Kalender.	Julianischer oder Alter Kalender.
Goldene Zahl	3	3
Epakten	XXI	III
Sonnencirkel	7	7
Römer Zinszahl	15	15
Sonntags-Buchstab	E	F
Septuagesima	Jan. 26	Febr. 10
Aschermittwoch	Febr. 12	Febr. 27
I. Quatember	Febr. 19	März 6
Ostersonntag	März 30	April 14
Himmelfahrt	Mai 8	Mai 23
Pfingstsonntag	Mai 18	Juni 2
II. Quatember	Mai 21	Juni 5
III. Quatember	Sept. 17	Sept. 18
I. Advent	Nov. 30	Dec. 1
IV. Quatember	Dec. 17	Dec. 18

Kalender der Mohamedaner.

1319		
Schewwâl 1	1902	Jan. 11
Dsû 'l-kade 1	»	Febr. 9
Dsû 'l-hedsche 1	»	März 11
1320 (Gemeinjahr)		
Moharrem 1	»	April 10
Safar 1	»	Mai 10
Rebî-el-awwel 1	»	Juni 8
Rebî-el-accher 1	»	Juli 8
Dschemâdi-el-awwel 1	»	Aug. 6
Dschemâdi-el-accher 1	»	Sept. 5
Redscheb 1	»	Oct. 4
Schabân 1	»	Nov. 3
Ramadân 1	»	Dec. 2
Schewwâl 1	1903	Jan. 1

Kalender der Juden.

5662	Schebat	1	. . . .	1902	Jan.	9
	Adar	1	. . . .	»	Febr.	8
		14	Klein Purim	»		21
	Veadar	1	. . . .	»	März	10
		11	Fasten-Esther	»		20
		14	Purim	»		23
		15	Schuschan-Purim	»		24
	Nisan	1	. . . .	»	April	8
		15	Passah-Anfang*	»		22
		16	Zweites Fest*	»		23
		21	Siebentes Fest*	»		28
		22	Achtes Fest*	»		29
	Ijar	1	. . . .	»	Mai	8
		18	Lag-B'omer	»		25
	Sivan	1	. . . .	»	Juni	6
		6	Wochenfest*	»		11
		7	Zweites Fest*	»		12
	Thamuz	1	. . . .	»	Juli	6
		17	Fasten. Tempel-Eroberung . . .	»		22
	Ab	1	. . . .	»	Aug.	4
		9	Fasten. Tempel-Verbrennung . .	»		12
	Elul	1	. . . .	»	Sept.	3
5663 { Ueberzähliges Gemeinjahr						
	Tischri	1	Neujahrsfest*	»	Oct.	2
		2	Zweites Fest*	»		3
		4	Fasten-Gedaljah	»		5
		10	Versöhnungsfest*	»		11
		15	Laubhüttenfest*	»		16
		16	Zweites Fest*	»		17
		21	Palmenfest	»		22
		22	Versammlung oder Laubhütten-Ende*	»		23
		23	Gesetzesfreude*	»		24
	Marcheschwan	1	. . . .	»	Nov.	1
	Kislev	1	. . . .	»	Dec.	1
		25	Tempelweihe	»		25
	Tebet	1	. . . .	»		31
		10	Fasten. Belagerung Jerusalems . .	1903	Jan.	9

Die mit * bezeichneten Festtage werden streng gefeiert.

1902	Schiefe der Ekliptik mittlere	Schiefe der Ekliptik scheinbare	Praecession in Länge	Nutation in Länge	Aberration der Sonne	Parallaxe der Sonne
	23°					
Jan. 0	27′ 7″.32	26′ 59″.77	— 0″.11	+11″.80	20″.82	8″.95
10	7.31	59.80	+ 1.26	12.10	20.81	8.95
20	7.30	26 59.88	2.64	12.30	20.80	8.94
30	7.28	27 0.00	4.01	12.36	20.77	8.93
Febr. 9	7.27	0.12	5.39	12.26	20.74	8.92
19	27 7.26	27 0.24	+ 6.77	+12.00	20.70	8.90
März 1	7.25	0.32	8.14	11.60	20.65	8.88
11	7.23	0.35	9.52	11.10	20.59	8.85
21	7.22	0.32	10.89	10.55	20.54	8.83
31	7.21	0.23	12.27	9.99	20.48	8.80
April 10	27 7.20	27 0.07	+13.64	+ 9.48	20.42	8.78
20	7.18	26 59.87	15.02	9.05	20.36	8.76
30	7.17	59.64	16.40	8.75	20.31	8.73
Mai 10	7.16	59.39	17.77	8.59	20.26	8.71
20	7.14	59.15	19.15	8.56	20.22	8.69
30	27 7.13	26 58.94	+20.53	+ 8.66	20.19	8.68
Juni 9	7.12	58.78	21.90	8.85	20.16	8.67
19	7.11	58.67	23.28	9.10	20.14	8.66
29	7.09	58.63	24.65	9.36	20.13	8.66
Juli 9	7.08	58.64	26.03	9.58	20.13	8.66
19	27 7.07	26 58.71	+27.40	+ 9.73	20.14	8.66
29	7.05	58.81	28.78	9.77	20.16	8.67
Aug. 8	7.04	58.93	30.16	9.68	20.19	8.68
18	7.03	59.06	31.53	9.45	20.23	8.70
28	7.02	59.16	32.91	9.09	20.27	8.72
Sept. 7	27 7.00	26 59.23	+34.28	+ 8.61	20.32	8.74
17	6.99	59.25	35.66	8.06	20.37	8.76
27	6.98	59.21	37.04	7.48	20.43	8.78
Oct. 7	6.96	59.10	38.41	6.92	20.49	8.81
17	6.95	58.94	39.79	6.43	20.55	8.84
27	27 6.94	26 58.73	+41.16	+ 6.04	20.60	8.86
Nov. 6	6.93	58.49	42.54	5.80	20.66	8.88
16	6.91	58.25	43.92	5.72	20.71	8.90
26	6.90	58.03	45.29	5.79	20.75	8.92
Dec. 6	6.89	57.85	46.67	5.99	20.78	8.93
16	27 6.88	26 57.72	+48.04	+ 6.28	20.80	8.94
26	6.86	57.67	49.42	6.60	20.81	8.95
36	6.85	57.69	50.80	6.91	20.82	8.95

Mittlere Schiefe der Ekliptik für 1900.0 = 23° 27′ 8″.26.

Mittlerer Berliner Mittag.

Monats- und Wochentag			Zeitgleichung M. Zt. — W. Zt.	AR. app.	Diff.	Decl. app.	Diff.	Durchg.-Dauer St.-Zt.	Halbm.
			m s	h m s	m s	° ′ ″	′ ″	s	′ ″
Jan.	1	Mi	+ 3 23.96	18 44 3.69	4 24.99	—23 3 49.2	4 53.0	141.87	16 16.00
	2	Do	3 52.40	18 48 28.68	4 24.68	22 58 56.2	5 20.5	141.79	16 16.00
	3	Fr	4 20.52	18 52 53.36	4 24.33	22 53 35.7	5 47.8	141.70	16 15.99
	4	Sa	4 48.29	18 57 17.69	4 23.95	22 47 47.9	6 15.1	141.59	16 15.98
	5	So	5 15.69	19 1 41.64	4 23.55	22 41 32.8	6 42.1	141.47	16 15.96
	6	Mo	+ 5 42.68	19 6 5.19	4 23.10	—22 34 50.7	7 8.9	141.35	16 15.93
	7	Di	6 9.22	19 10 28.29	4 22.63	22 27 41.8	7 35.4	141.22	16 15.90
	8	Mi	6 35.29	19 14 50.92	4 22.13	22 20 6.4	8 1.9	141.09	16 15.88
	9	Do	7 0.87	19 19 13.05	4 21.61	22 12 4.5	8 27.9	140.95	16 15.85
	10	Fr	7 25.92	19 23 34.66	4 21.04	22 3 36.6	8 53.8	140.80	16 15.82
	11	Sa	+ 7 50.40	19 27 55.70	4 20.45	—21 54 42.8	9 19.4	140.65	16 15.78
	12	So	8 14.30	19 32 16.15	4 19.85	21 45 23.4	9 44.7	140.49	16 15.73
	13	Mo	8 37.59	19 36 36.00	4 19.21	21 35 38.7	10 9.7	140.32	16 15.68
	14	Di	9 0.24	19 40 55.21	4 18.54	21 25 29.0	10 34.4	140.15	16 15.63
	15	Mi	9 22.23	19 45 13.75	4 17.85	21 14 54.6	10 58.8	139.97	16 15.58
	16	Do	+ 9 43.53	19 49 31.60	4 17.16	—21 3 55.8	11 22.9	139.79	16 15.51
	17	Fr	10 4.13	19 53 48.76	4 16.45	20 52 32.9	11 46.7	139.60	16 15.44
	18	Sa	10 24.02	19 58 5.21	4 15.70	20 40 46.2	12 10.1	139.41	16 15.37
	19	So	10 43.17	20 2 20.91	4 14.94	20 28 36.1	12 33.3	139.21	16 15.29
	20	Mo	11 1.56	20 6 35.85	4 14.19	20 16 2.8	12 56.1	139.01	16 15.22
	21	Di	+11 19.18	20 10 50.04	4 13.42	—20 3 6.7	13 18.5	138.80	16 15.13
	22	Mi	11 36.04	20 15 3.46	4 12.65	19 49 48.2	13 40.7	138.59	16 15.04
	23	Do	11 52.13	20 19 16.11	4 11.85	19 36 7.5	14 2.4	138.38	16 14.94
	24	Fr	12 7.43	20 23 27.96	4 11.08	19 22 5.1	14 23.9	138.17	16 14.83
	25	Sa	12 21.95	20 27 39.04	4 10.29	19 7 41.2	14 45.0	137.95	16 14.72
	26	So	+12 35.69	20 31 49.33	4 9.49	—18 52 56.2	15 5.6	137.73	16 14.60
	27	Mo	12 48.63	20 35 58.82	4 8.70	18 37 50.6	15 26.0	137.51	16 14.47
	28	Di	13 0.77	20 40 7.52	4 7.89	18 22 24.6	15 45.9	137.28	16 14.34
	29	Mi	13 12.11	20 44 15.41	4 7.11	18 6 38.7	16 5.5	137.05	16 14.20
	30	Do	13 22.66	20 48 22.52	4 6.30	17 50 33.2	16 24.6	136.82	16 14.06
	31	Fr	+13 32.41	20 52 28.82	4 5.51	—17 34 8.6	16 43.5	136.59	16 13.92
Febr.	1	Sa	13 41.36	20 56 34.33	4 4.69	17 17 25.1	17 1.8	136.36	16 13.77
	2	So	13 49.49	21 0 39.02	4 3.88	17 0 23.3	17 19.7	136.13	16 13.62
	3	Mo	13 56.81	21 4 42.90	4 3.09	16 43 3.6	17 37.3	135.90	16 13.46
	4	Di	14 3.34	21 8 45.99	4 2.27	16 25 26.3	17 54.4	135.67	16 13.30
	5	Mi	+14 9.07	21 12 48.26	4 1.48	—16 7 31.9	18 11.1	135.44	16 13.15
	6	Do	14 13.99	21 16 49.74	4 0.66	15 49 20.8	18 27.3	135.21	16 12.99
	7	Fr	14 18.10	21 20 50.40	3 59.87	15 30 53.5	18 43.1	134.98	16 12.82
	8	Sa	14 21.41	21 24 50.27	3 59.06	15 12 10.4	18 58.5	134.75	16 12.64
	9	So	14 23.92	21 28 49.33		14 53 11.9		134.53	16 12.46

Mittlerer Berliner Mittag.

Monats- und Jahrestag			Sternzeit	Mittleres Aequ. 1902.0 Länge	Diff.	Breite	Lg. Rad. v.	Diff.	Nut. ☾ in 0".01 dλ	dε
			h m s	° ′ ″	′ ″	″				
Jan.	1	1	18 40 39.73	280 7 39.77	61 9.80	−0.85	9.9926540	15	+ 4	+9
	2	2	18 44 36.28	281 8 49.57	61 10.08	−0.73	9.9926555	36	− 6	+8
	3	3	18 48 32.84	282 9 59.65	61 10.29	−0.61	9.9926591	57	−14	+5
	4	4	18 52 29.40	283 11 9.94	61 10.43	−0.48	9.9926648	77	−18	+1
	5	5	18 56 25.96	284 12 20.37	61 10.52	−0.35	9.9926725	97	−19	−3
	6	6	19 0 22.51	285 13 30.89	61 10.53	−0.23	9.9926822	116	−16	−6
	7	7	19 4 19.07	286 14 41.42	61 10.47	−0.13	9.9926938	133	− 9	−8
	8	8	19 8 15.63	287 15 51.89	61 10.32	−0.04	9.9927071	149	− 1	−9
	9	9	19 12 12.18	288 17 2.21	61 10.08	+0.03	9.9927220	166	+ 7	−7
	10	10	19 16 8.74	289 18 12.29	61 9.74	+0.08	9.9927386	182	+12	−4
	11	11	19 20 5.30	290 19 22.03	61 9.32	+0.10	9.9927568	200	+13	0
	12	12	19 24 1.85	291 20 31.35	61 8.80	+0.09	9.9927768	218	+12	+4
	13	13	19 27 58.41	292 21 40.15	61 8.18	+0.05	9.9927986	236	+ 6	+7
	14	14	19 31 54.97	293 22 48.33	61 7.47	−0.02	9.9928222	254	− 1	+9
	15	15	19 35 51.52	294 23 55.80	61 6.69	−0.11	9.9928476	272	− 9	+9
	16	16	19 39 48.08	295 25 2.49	61 5.86	−0.22	9.9928748	293	−17	+7
	17	17	19 43 44.63	296 26 8.35	61 4.99	−0.34	9.9929041	316	−22	+4
	18	18	19 47 41.18	297 27 13.34	61 4.09	−0.46	9.9929357	340	−21	0
	19	19	19 51 37.74	298 28 17.43	61 3.17	−0.58	9.9929697	364	−18	−4
	20	20	19 55 34.30	299 29 20.60	61 2.25	−0.70	9.9930061	390	−10	−7
	21	21	19 59 30.86	300 30 22.85	61 1.34	−0.80	9.9930451	416	0	−9
	22	22	20 3 27.42	301 31 24.19	61 0.47	−0.87	9.9930867	444	+10	−8
	23	23	20 7 23.97	302 32 24.66	60 59.66	−0.91	9.9931311	471	+19	−6
	24	24	20 11 20.53	303 33 24.32	60 58.88	−0.92	9.9931782	499	+25	−3
	25	25	20 15 17.09	304 34 23.20	60 58.13	−0.90	9.9932281	527	+27	+1
	26	26	20 19 13.64	305 35 21.33	60 57.40	−0.84	9.9932808	552	+24	+5
	27	27	20 23 10.20	306 36 18.73	60 56.69	−0.76	9.9933360	577	+18	+8
	28	28	20 27 6.75	307 37 15.42	60 55.98	−0.67	9.9933937	600	+ 8	+9
	29	29	20 31 3.31	308 38 11.40	60 55.25	−0.56	9.9934537	622	− 2	+8
	30	30	20 34 59.86	309 39 6.65	60 54.50	−0.43	9.9935159	644	−11	+6
	31	31	20 38 56.42	310 40 1.15	60 53.72	−0.30	9.9935803	663	−17	+2
Febr.	1	32	20 42 52.97	311 40 54.87	60 52.89	−0.18	9.9936466	680	−19	−2
	2	33	20 46 49.53	312 41 47.76	60 52.01	−0.06	9.9937146	698	−16	−5
	3	34	20 50 46.09	313 42 39.77	60 51.08	+0.05	9.9937844	714	−11	−8
	4	35	20 54 42.64	314 43 30.85	60 50.10	+0.15	9.9938558	729	− 3	−9
	5	36	20 58 39.19	315 44 20.95	60 49.04	+0.23	9.9939287	743	+ 4	−8
	6	37	21 2 35.75	316 45 9.99	60 47.92	+0.28	9.9940030	754	+10	−5
	7	38	21 6 32.30	317 45 57.91	60 46.72	+0.30	9.9940784	764	+14	−2
	8	39	21 10 28.86	318 46 44.63	60 45.43	+0.29	9.9941548	775	+13	+2
	9	40	21 14 25.41	319 47 30.06		+0.26	9.9942323		+ 8	+6

Mittlerer Berliner Mittag.

Monats- und Wochentag			Zeitgleichung M. Zt. — W. Zt.	AR. app.	Diff.	Decl. app.	Diff.	Durchg.-Dauer St.-Zt.	Halbm.
			m s	h m s	m s	° ' "	' "	s	' "
Febr.	8	Sa	+14 21.41	21 24 50.27	3 59.06	—15 12 10.4	18 58.5	134.75	16 12.64
	9	So	14 23.92	21 28 49.33	3 58.28	14 53 11.9	19 13.5	134.53	16 12.46
	10	Mo	14 25.64	21 32 47.61	3 57.49	14 33 58.4	19 28.1	134.31	16 12.28
	11	Di	14 26.58	21 36 45.10	3 56.71	14 14 30.3	19 42.2	134.09	16 12.10
	12	Mi	14 26.74	21 40 41.81	3 55.93	13 54 48.1	19 55.9	133.87	16 11.92
	13	Do	+14 26.11	21 44 37.74	3 55.14	—13 34 52.2	20 9.1	133.65	16 11.74
	14	Fr	14 24.70	21 48 32.88	3 54.38	13 14 43.1	20 21.9	133.44	16 11.55
	15	Sa	14 22.52	21 52 27.26	3 53.62	12 54 21.2	20 34.2	133.23	16 11.36
	16	So	14 19.59	21 56 20.88	3 52.88	12 33 47.0	20 46.3	133.02	16 11.16
	17	Mo	14 15.92	22 0 13.76	3 52.16	12 13 0.7	20 57.9	132.82	16 10.96
	18	Di	+14 11.52	22 4 5.92	3 51.43	—11 52 2.8	21 9.1	132.62	16 10.76
	19	Mi	14 6.40	22 7 57.35	3 50.74	11 30 53.7	21 19.8	132.42	16 10.55
	20	Do	14 0.59	22 11 48.09	3 50.07	11 9 33.9	21 30.3	132.23	16 10.34
	21	Fr	13 54.10	22 15 38.16	3 49.40	10 48 3.6	21 40.3	132.04	16 10.12
	22	Sa	13 46.95	22 19 27.56	3 48.76	10 26 23.3	21 49.9	131.85	16 9.90
	23	So	+13 39.16	22 23 16.32	3 48.15	—10 4 33.4	21 59.1	131.67	16 9.68
	24	Mo	13 30.75	22 27 4.47	3 47.54	9 42 34.3	22 8.0	131.49	16 9.46
	25	Di	13 21.74	22 30 52.01	3 46.96	9 20 26.3	22 16.5	131.31	16 9.23
	26	Mi	13 12.15	22 34 38.97	3 46.41	8 58 9.8	22 24.5	131.14	16 8.99
	27	Do	13 2.00	22 38 25.38	3 45.85	8 35 45.3	22 32.2	130.97	16 8.75
	28	Fr	+12 51.30	22 42 11.23	3 45.33	— 8 13 13.1	22 39.5	130.81	16 8.51
März	1	Sa	12 40.09	22 45 56.56	3 44.84	7 50 33.6	22 46.3	130.66	16 8.26
	2	So	12 28.37	22 49 41.40	3 44.34	7 27 47.3	22 52.9	130.51	16 8.02
	3	Mo	12 16.16	22 53 25.74	3 43.87	7 4 54.4	22 58.9	130.36	16 7.77
	4	Di	12 3.47	22 57 9.61	3 43.42	6 41 55.5	23 4.6	130.22	16 7.52
	5	Mi	+11 50.34	23 0 53.03	3 42.99	— 6 18 50.9	23 9.9	130.09	16 7.26
	6	Do	11 36.78	23 4 36.02	3 42.58	5 55 41.0	23 14.7	129.96	16 7.01
	7	Fr	11 22.81	23 8 18.60	3 42.17	5 32 26.3	23 19.2	129.84	16 6.75
	8	Sa	11 8.43	23 12 0.77	3 41.79	5 9 7.1	23 23.4	129.72	16 6.50
	9	So	10 53.66	23 15 42.56	3 41.43	4 45 43.7	23 27.1	129.61	16 6.24
	10	Mo	+10 38.53	23 19 23.99	3 41.07	— 4 22 16.6	23 30.3	129.51	16 5.98
	11	Di	10 23.06	23 23 5.06	3 40.75	3 58 46.3	23 33.1	129.41	16 5.72
	12	Mi	10 7.26	23 26 45.81	3 40.43	3 35 13.2	23 35.7	129.32	16 5.46
	13	Do	9 51.14	23 30 26.24	3 40.12	3 11 37.5	23 37.7	129.23	16 5.20
	14	Fr	9 34.70	23 34 6.36	3 39.83	2 47 59.8	23 39.4	129.15	16 4.94
	15	Sa	+ 9 17.98	23 37 46.19	3 39.56	— 2 24 20.4	23 40.7	129.07	16 4.68
	16	So	9 0.99	23 41 25.75	3 39.32	2 0 39.7	23 41.7	129.00	16 4.42
	17	Mo	8 43.76	23 45 5.07	3 39.09	1 36 58.0	23 42.3	128.94	16 4.16
	18	Di	8 26.30	23 48 44.16	3 38.88	1 13 15.7	23 42.4	128.88	16 3.90
	19	Mi	8 8.63	23 52 23.04		0 49 33.3		128.83	16 3.63

Mittlerer Berliner Mittag.

Monats- und Jahrestag		Sternzeit	Mittleres Aequ. 1902.0 Länge	Diff.	Breite	Lg. Rad. v.	Diff.	Nut. ☾ in 0″.01 dλ	dε
Febr. 8	39	21ʰ 10ᵐ 28ˢ.86	318° 46′ 44″.63	60′ 45″.43	+0″.29	9.9941548	775	+13	+2
9	40	21 14 25.41	319 47 30.06	60 44.04	+0.26	9.9942323	789	+ 8	+6
10	41	21 18 21.97	320 48 14.10	60 42.56	+0.19	9.9943112	804	+ 2	+8
11	42	21 22 18.52	321 48 56.66	60 41.00	+0.10	9.9943916	818	− 7	+9
12	43	21 26 15.07	322 49 37.66	60 39.35	−0.01	9.9944734	829	−15	+8
13	44	21 30 11.63	323 50 17.01	60 37.63	−0.13	9.9945563	839	−21	+5
14	45	21 34 8.18	324 50 54.64	60 35.87	−0.26	9.9946402	852	−22	+1
15	46	21 38 4.73	325 51 30.51	60 34.06	−0.39	9.9947254	868	−20	−3
16	47	21 42 1.29	326 52 4.57	60 32.23	−0.51	9.9948122	886	−13	−6
17	48	21 45 57.84	327 52 36.80	60 30.39	−0.62	9.9949008	903	− 4	−8
18	49	21 49 54.40	328 53 7.19	60 28.58	−0.70	9.9949911	921	+ 7	−9
19	50	21 53 50.95	329 53 35.77	60 26.80	−0.75	9.9950832	942	+17	−7
20	51	21 57 47.50	330 54 2.57	60 25.05	−0.77	9.9951774	963	+24	−4
21	52	22 1 44.06	331 54 27.62	60 23.33	−0.76	9.9952737	983	+26	0
22	53	22 5 40.61	332 54 50.95	60 21.67	−0.71	9.9953720	1002	+26	+4
23	54	22 9 37.16	333 55 12.62	60 20.05	−0.64	9.9954722	1021	+20	+7
24	55	22 13 33.71	334 55 32.67	60 18.47	−0.55	9.9955743	1039	+11	+9
25	56	22 17 30.27	335 55 51.14	60 16.91	−0.44	9.9956782	1055	+ 2	+9
26	57	22 21 26.82	336 56 8.05	60 15.38	−0.31	9.9957837	1071	− 8	+7
27	58	22 25 23.37	337 56 23.43	60 13.85	−0.18	9.9958908	1087	−16	+4
28	59	22 29 19.93	338 56 37.28	60 12.31	−0.06	9.9959995	1101	−18	0
März 1	60	22 33 16.48	339 56 49.59	60 10.77	+0.06	9.9961096	1113	−18	−4
2	61	22 37 13.03	340 57 0.36	60 9.21	+0.17	9.9962209	1123	−13	−7
3	62	22 41 9.58	341 57 9.57	60 7.64	+0.27	9.9963332	1133	− 6	−9
4	63	22 45 6.14	342 57 17.21	60 6.05	+0.34	9.9964465	1141	+ 2	−8
5	64	22 49 2.69	343 57 23.26	60 4.42	+0.39	9.9965606	1149	+ 9	−6
6	65	22 52 59.24	344 57 27.68	60 2.75	+0.41	9.9966755	1154	+13	−3
7	66	22 56 55.79	345 57 30.43	60 1.02	+0.41	9.9967909	1157	+13	+1
8	67	23 0 52.34	346 57 31.45	59 59.22	+0.38	9.9969066	1159	+10	+5
9	68	23 4 48.90	347 57 30.67	59 57.35	+0.32	9.9970225	1161	+ 4	+8
10	69	23 8 45.45	348 57 28.02	59 55.39	+0.24	9.9971386	1164	− 4	+9
11	70	23 12 42.00	349 57 23.41	59 53.36	+0.13	9.9972550	1166	−13	+8
12	71	23 16 38.55	350 57 16.77	59 51.24	0.00	9.9973716	1168	−19	+6
13	72	23 20 35.10	351 57 8.01	59 49.04	−0.13	9.9974884	1169	−23	+2
14	73	23 24 31.66	352 56 57.05	59 46.78	−0.27	9.9976053	1171	−22	−2
15	74	23 28 28.21	353 56 43.83	59 44.50	−0.40	9.9977224	1175	−16	−5
16	75	23 32 24.76	354 56 28.33	59 42.20	−0.51	9.9978399	1181	− 8	−8
17	76	23 36 21.31	355 56 10.53	59 39.89	−0.59	9.9979580	1187	+ 3	−9
18	77	23 40 17.86	356 55 50.42	59 37.59	−0.65	9.9980767	1194	+13	−8
19	78	23 44 14.42	357 55 28.01		−0.69	9.9981961		+21	−5

Mittlerer Berliner Mittag.

Monats- und	Wochentag	Zeitgleichung M. Zt. — W. Zt.	AR. app.	Diff.	Decl. app.	Diff.	Durchg.-Dauer St.-Zt.	Halbm.
		m s	h m s	m s	° ′ ″	′ ″	s	′ ″
März 18	Di	+8 26.30	23 48 44.16	3 38.88	— 1 13 15.7	23 42.4	128.88	16 3.90
19	Mi	8 8.63	23 52 23.04	3 38.70	0 49 33.3	23 42.4	128.83	16 3.63
20	Do	7 50.77	23 56 1.74	3 38.54	0 25 50.9	23 41.9	128.78	16 3.36
21	Fr	7 32.76	23 59 40.28	3 38.41	— 0 2 9.0	23 41.1	128.74	16 3.09
22	Sa	7 14.62	0 3 18.69	3 38.29	+ 0 21 32.1	23 39.9	128.71	16 2.82
23	So	+6 56.36	0 6 56.98	3 38.20	+ 0 45 12.0	23 38.4	128.68	16 2.54
24	Mo	6 38.01	0 10 35.18	3 38.14	1 8 50.4	23 36.7	128.66	16 2.26
25	Di	6 19.59	0 14 13.32	3 38.10	1 32 27.1	23 34.4	128.64	16 1.98
26	Mi	6 1.14	0 17 51.42	3 38.09	1 56 1.5	23 32.0	128.63	16 1.71
27	Do	5 42.68	0 21 29.51	3 38.09	2 19 33.5	23 29.1	128.62	16 1.44
28	Fr	+5 24.22	0 25 7.60	3 38.11	+ 2 43 2.6	23 25.8	128.62	16 1.16
29	Sa	5 5.78	0 28 45.71	3 38.17	3 6 28.4	23 22.4	128.63	16 0.88
30	So	4 47.39	0 32 23.88	3 38.24	3 29 50.8	23 18.4	128.64	16 0.60
31	Mo	4 29.08	0 36 2.12	3 38.33	3 53 9.2	23 14.3	128.66	16 0.31
April 1	Di	4 10.86	0 39 40.45	3 38.44	4 16 23.5	23 9.6	128.68	16 0.02
2	Mi	+3 52.75	0 43 18.89	3 38.58	+ 4 39 33.1	23 4.7	128.71	15 59.74
3	Do	3 34.78	0 46 57.47	3 38.73	5 2 37.8	22 59.3	128.75	15 59.46
4	Fr	3 16.95	0 50 36.20	3 38.89	5 25 37.1	22 53.8	128.79	15 59.18
5	Sa	2 59.29	0 54 15.09	3 39.06	5 48 30.9	22 47.7	128.84	15 58.90
6	So	2 41.81	0 57 54.15	3 39.27	6 11 18.6	22 41.4	128.89	15 58.62
7	Mo	+2 24.52	1 1 33.42	3 39.48	+ 6 34 0.0	22 34.7	128.95	15 58.34
8	Di	2 7.44	1 5 12.90	3 39.71	6 56 34.7	22 27.5	129.02	15 58.07
9	Mi	1 50.59	1 8 52.61	3 39.94	7 19 2.2	22 20.1	129.09	15 57.80
10	Do	1 33.99	1 12 32.55	3 40.20	7 41 22.3	22 12.3	129.16	15 57.53
11	Fr	1 17.64	1 16 12.75	3 40.45	8 3 34.6	22 4.1	129.24	15 57.26
12	Sa	+1 1.54	1 19 53.20	3 40.74	+ 8 25 38.7	21 55.6	129.33	15 57.00
13	So	0 45.72	1 23 33.94	3 41.03	8 47 34.3	21 46.7	129.42	15 56.73
14	Mo	0 30.20	1 27 14.97	3 41.34	9 9 21.0	21 37.6	129.51	15 56.46
15	Di	0 14.99	1 30 56.31	3 41.66	9 30 58.6	21 28.0	129.61	15 56.20
16	Mi	+0 0.09	1 34 37.97	3 41.99	9 52 26.6	21 18.1	129.71	15 55.95
17	Do	—0 14.47	1 38 19.96	3 42.35	+10 13 44.7	21 8.0	129.82	15 55.69
18	Fr	0 28.67	1 42 2.31	3 42.72	10 34 52.7	20 57.5	129.93	15 55.43
19	Sa	0 42.51	1 45 45.03	3 43.10	10 55 50.2	20 46.6	130.05	15 55.17
20	So	0 55.96	1 49 28.13	3 43.52	11 16 36.8	20 35.5	130.17	15 54.91
21	Mo	1 8.99	1 53 11.65	3 43.94	11 37 12.3	20 24.1	130.29	15 54.66
22	Di	—1 21.60	1 56 55.59	3 44.38	+11 57 36.4	20 12.3	130.42	15 54.40
23	Mi	1 33.78	2 0 39.97	3 44.83	12 17 48.7	20 0.2	130.55	15 54.15
24	Do	1 45.50	2 4 24.80	3 45.30	12 37 48.9	19 47.8	130.68	15 53.90
25	Fr	1 56.75	2 8 10.10	3 45.79	12 57 36.7	19 35.1	130.82	15 53.64
26	Sa	2 7.52	2 11 55.89		13 17 11.8		130.96	15 53.38

Mittlerer Berliner Mittag.

Monats- und Jahrestag		Sternzeit	Mittleres Aequ. 1902.0 Länge	Diff.	Breite	Lg. Rad. v.	Diff.	Nut. ☾ in 0″.01 dλ	dε
		h m s	° ′ ″	′ ″	″				
März 18	77	23 40 17.86	356 55 50.42	59 37.59	−0.65	9.9980767	1194	+13	−8
19	78	23 44 14.42	357 55 28.01	59 35.33	−0.69	9.9981961	1203	+21	−5
20	79	23 48 10.97	358 55 3.34	59 33.11	−0.70	9.9983164	1211	+26	−2
21	80	23 52 7.52	359 54 36.45	59 30.92	−0.67	9.9984375	1220	+27	+2
22	81	23 56 4.07	0 54 7.37	59 28.77	−0.61	9.9985595	1229	+22	+6
23	82	0 0 0.62	1 53 36.14	59 26.69	−0.52	9.9986824	1239	+15	+8
24	83	0 3 57.18	2 53 2.83	59 24.68	−0.41	9.9988063	1248	+ 5	+9
25	84	0 7 53.73	3 52 27.51	59 22.71	−0.29	9.9989311	1256	− 5	+8
26	85	0 11 50.28	4 51 50.22	59 20.79	−0.17	9.9990567	1262	−13	+5
27	86	0 15 46.83	5 51 11.01	59 18.91	−0.04	9.9991829	1267	−17	+1
28	87	0 19 43.38	6 50 29.92	59 17.06	+0.08	9.9993096	1271	−18	−3
29	88	0 23 39.93	7 49 46.98	59 15.23	+0.19	9.9994367	1275	−14	−6
30	89	0 27 36.49	8 49 2.21	59 13.42	+0.29	9.9995642	1278	− 8	−8
31	90	0 31 33.04	9 48 15.63	59 11.63	+0.37	9.9996920	1280	0	−9
April 1	91	0 35 29.59	10 47 27.26	59 9.86	+0.43	9.9998200	1280	+ 8	−7
2	92	0 39 26.14	11 46 37.12	59 8.08	+0.46	9.9999480	1279	+12	−4
3	93	0 43 22.69	12 45 45.20	59 6.29	+0.46	0.0000759	1275	+14	0
4	94	0 47 19.25	13 44 51.49	59 4.48	+0.43	0.0002034	1268	+12	+4
5	95	0 51 15.80	14 43 55.97	59 2.65	+0.37	0.0003302	1261	+ 5	+7
6	96	0 55 12.35	15 42 58.62	59 0.77	+0.28	0.0004563	1254	− 2	+9
7	97	0 59 8.90	16 41 59.39	58 58.82	+0.17	0.0005817	1247	−11	+9
8	98	1 3 5.46	17 40 58.21	58 56.80	+0.04	0.0007064	1238	−18	+7
9	99	1 7 2.01	18 39 55.01	58 54.70	−0.10	0.0008302	1228	−23	+4
10	100	1 10 58.56	19 38 49.71	58 52.54	−0.24	0.0009530	1217	−22	0
11	101	1 14 55.11	20 37 42.25	58 50.35	−0.38	0.0010747	1208	−19	−4
12	102	1 18 51.66	21 36 32.60	58 48.11	−0.50	0.0011955	1200	−11	−7
13	103	1 22 48.22	22 35 20.71	58 45.82	−0.60	0.0013155	1193	− 1	−9
14	104	1 26 44.77	23 34 6.53	58 43.52	−0.67	0.0014348	1187	+10	−8
15	105	1 30 41.32	24 32 50.05	58 41.24	−0.71	0.0015535	1183	+19	−6
16	106	1 34 37.88	25 31 31.29	58 39.01	−0.73	0.0016718	1178	+25	−3
17	107	1 38 34.43	26 30 10.30	58 36.81	−0.71	0.0017896	1175	+26	+1
18	108	1 42 30.98	27 28 47.11	58 34.65	−0.66	0.0019071	1173	+24	+5
19	109	1 46 27.54	28 27 21.76	58 32.54	−0.58	0.0020244	1171	+17	+8
20	110	1 50 24.09	29 25 54.30	58 30.50	−0.48	0.0021415	1170	+ 7	+9
21	111	1 54 20.64	30 24 24.80	58 28.54	−0.36	0.0022585	1167	− 2	+8
22	112	1 58 17.19	31 22 53.34	58 26.65	−0.23	0.0023752	1165	−10	+6
23	113	2 2 13.75	32 21 19.99	58 24.81	−0.09	0.0024917	1162	−17	+2
24	114	2 6 10.30	33 19 44.80	58 23.03	+0.04	0.0026079	1158	−18	−2
25	115	2 10 6.85	34 18 7.83	58 21.30	+0.16	0.0027237	1155	−15	−5
26	116	2 14 3.41	35 16 29.13		+0.26	0.0028392		−10	−8

Mittlerer Berliner Mittag.

Monats- und Wochentag		Zeitgleichung M. Zt. — W. Zt. (m s)	AR. app. (h m s)	Diff. (m s)	Decl. app. (° ′ ″)	Diff. (′ ″)	Durchg.-Dauer St.-Zt. (s)	Halbm. (′ ″)
April 25	Fr	—1 56.75	2 8 10.10	3 45.79	+12 57 36.7	19 35.1	130.82	15 53.64
26	Sa	2 7.52	2 11 55.89	3 46.28	13 17 11.8	19 22.1	130.96	15 53.38
27	So	2 17.79	2 15 42.17	3 46.80	13 36 33.9	19 8.6	131.10	15 53.13
28	Mo	2 27.55	2 19 28.97	3 47.32	13 55 42.5	18 55.0	131.24	15 52.88
29	Di	2 36.79	2 23 16.29	3 47.84	14 14 37.5	18 41.0	131.39	15 52.63
30	Mi	—2 45.49	2 27 4.13	3 48.40	+14 33 18.5	18 26.7	131.54	15 52.38
Mai 1	Do	2 53.65	2 30 52.53	3 48.95	14 51 45.2	18 12.1	131.69	15 52.13
2	Fr	3 1.26	2 34 41.48	3 49.50	15 9 57.3	17 57.1	131.85	15 51.89
3	Sa	3 8.31	2 38 30.98	3 50.07	15 27 54.4	17 41.9	132.00	15 51.65
4	So	3 14.79	2 42 21.05	3 50.64	15 45 36.3	17 26.3	132.16	15 51.41
5	Mo	—3 20.71	2 46 11.69	3 51.20	+16 3 2.6	17 10.3	132.32	15 51.18
6	Di	3 26.06	2 50 2.89	3 51.78	16 20 12.9	16 54.1	132.48	15 50.95
7	Mi	3 30.83	2 53 54.67	3 52.35	16 37 7.0	16 37.6	132.64	15 50.72
8	Do	3 35.04	2 57 47.02	3 52.91	16 53 44.6	16 20.6	132.81	15 50.50
9	Fr	3 38.68	3 1 39.93	3 53.48	17 10 5.2	16 3.5	132.98	15 50.29
10	Sa	—3 41.76	3 5 33.41	3 54.03	+17 26 8.7	15 46.0	133.14	15 50.08
11	So	3 44.28	3 9 27.44	3 54.60	17 41 54.7	15 28.2	133.30	15 49.87
12	Mo	3 46.24	3 13 22.04	3 55.16	17 57 22.9	15 10.1	133.47	15 49.66
13	Di	3 47.64	3 17 17.20	3 55.70	18 12 33.0	14 51.7	133.64	15 49.45
14	Mi	3 48.49	3 21 12.90	3 56.26	18 27 24.7	14 33.1	133.80	15 49.25
15	Do	—3 48.78	3 25 9.16	3 56.81	+18 41 57.8	14 14.1	133.97	15 49.06
16	Fr	3 48.53	3 29 5.97	3 57.35	18 56 11.9	13 54.8	134.13	15 48.87
17	Sa	3 47.73	3 33 3.32	3 57.91	19 10 6.7	13 35.4	134.29	15 48.68
18	So	3 46.38	3 37 1.23	3 58.46	19 23 42.1	13 15.7	134.45	15 48.49
19	Mo	3 44.48	3 40 59.69	3 58.99	19 36 57.8	12 55.7	134.61	15 48.30
20	Di	—3 42.04	3 44 58.68	3 59.54	+19 49 53.5	12 35.4	134.76	15 48.12
21	Mi	3 39.06	3 48 58.22	4 0.08	20 2 28.9	12 15.0	134.91	15 47.94
22	Do	3 35.54	3 52 58.30	4 0.61	20 14 43.9	11 54.2	135.06	15 47.76
23	Fr	3 31.48	3 56 58.91	4 1.14	20 26 38.1	11 33.2	135.21	15 47.59
24	Sa	3 26.89	4 1 0.05	4 1.66	20 38 11.3	11 12.0	135.36	15 47.42
25	So	—3 21.79	4 5 1.71	4 2.17	+20 49 23.3	10 50.6	135.51	15 47.26
26	Mo	3 16.17	4 9 3.88	4 2.69	21 0 13.9	10 28.9	135.65	15 47.09
27	Di	3 10.04	4 13 6.57	4 3.19	21 10 42.8	10 7.0	135.79	15 46.92
28	Mi	3 3.41	4 17 9.76	4 3.66	21 20 49.8	9 44.9	135.92	15 46.76
29	Do	2 56.30	4 21 13.42	4 4.15	21 30 34.7	9 22.7	136.05	15 46.60
30	Fr	—2 48.71	4 25 17.57	4 4.62	+21 39 57.4	9 0.1	136.17	15 46.44
31	Sa	2 40.65	4 29 22.19	4 5.06	21 48 57.5	8 37.4	136.29	15 46.29
Juni 1	So	2 32.15	4 33 27.25	4 5.49	21 57 34.9	8 14.6	136.41	15 46.15
2	Mo	2 23.21	4 37 32.74	4 5.92	22 5 49.5	7 51.5	136.52	15 46.00
3	Di	2 13.85	4 41 38.66		22 13 41.0		136.63	15 45.86

Mittlerer Berliner Mittag.

Monats- und Jahrestag		Sternzeit	Mittleres Aequ. 1902.0 Länge	Diff.	Breite	Lg. Rad. v.	Diff.	Nut. ☾ in 0".01 $d\lambda$	$d\varepsilon$
April 25	115	2h 10m 6s.85	34° 18′ 7″.83	58′ 21″.30	+0″.16	0.0027237	1155	−15	−5
26	116	2 14 3.41	35 16 29.13	58 19.63	+0.26	0.0028392	1150	−10	−8
27	117	2 17 59.96	36 14 48.76	58 18.01	+0.34	0.0029542	1145	− 2	−9
28	118	2 21 56.52	37 13 6.77	58 16.44	+0.40	0.0030687	1138	+ 5	−8
29	119	2 25 53.07	38 11 23.21	58 14.92	+0.43	0.0031825	1129	+11	−5
30	120	2 29 49.62	39 9 38.13	58 13.43	+0.44	0.0032954	1120	+14	−2
Mai 1	121	2 33 46.18	40 7 51.56	58 11.96	+0.42	0.0034074	1110	+14	+2
2	122	2 37 42.73	41 6 3.52	58 10.51	+0.37	0.0035184	1096	+ 8	+6
3	123	2 41 39.29	42 4 14.03	58 9.06	+0.29	0.0036280	1081	+ 1	+8
4	124	2 45 35.84	43 2 23.09	58 7.61	+0.19	0.0037361	1066	− 8	+9
5	125	2 49 32.39	44 0 30.70	58 6.11	+0.08	0.0038427	1049	−16	+8
6	126	2 53 28.95	44 58 36.81	58 4.56	−0.05	0.0039476	1031	−21	+5
7	127	2 57 25.50	45 56 41.37	58 2.97	−0.19	0.0040507	1012	−23	+1
8	128	3 1 22.06	46 54 44.34	58 1.31	−0.32	0.0041519	993	−21	−3
9	129	3 5 18.61	47 52 45.65	57 59.59	−0.44	0.0042512	974	−14	−6
10	130	3 9 15.17	48 50 45.24	57 57.82	−0.55	0.0043486	956	− 5	−8
11	131	3 13 11.72	49 48 43.06	57 56.02	−0.63	0.0044442	938	+ 6	−9
12	132	3 17 8.28	50 46 39.08	57 54.21	−0.68	0.0045380	920	+16	−7
13	133	3 21 4.83	51 44 33.29	57 52.42	−0.70	0.0046300	905	+23	−4
14	134	3 25 1.39	52 42 25.71	57 50.65	−0.69	0.0047205	892	+26	0
15	135	3 28 57.94	53 40 16.36	57 48.91	−0.65	0.0048097	880	+26	+4
16	136	3 32 54.50	54 38 5.27	57 47.21	−0.57	0.0048977	867	+20	+7
17	137	3 36 51.05	55 35 52.48	57 45.57	−0.47	0.0049844	854	+11	+9
18	138	3 40 47.61	56 33 38.05	57 43.99	−0.35	0.0050698	844	+ 1	+9
19	139	3 44 44.17	57 31 22.04	57 42.48	−0.23	0.0051542	834	− 8	+7
20	140	3 48 40.72	58 29 4.52	57 41.05	−0.11	0.0052376	824	−15	+4
21	141	3 52 37.28	59 26 45.57	57 39.70	+0.02	0.0053200	812	−17	0
22	142	3 56 33.83	60 24 25.27	57 38.42	+0.15	0.0054012	802	−17	−4
23	143	4 0 30.39	61 22 3.69	57 37.21	+0.26	0.0054814	792	−12	−7
24	144	4 4 26.94	62 19 40.90	57 36.06	+0.34	0.0055606	781	− 5	−9
25	145	4 8 23.50	63 17 16.96	57 34.98	+0.41	0.0056387	767	+ 3	−8
26	146	4 12 20.06	64 14 51.94	57 33.97	+0.46	0.0057154	755	+10	−6
27	147	4 16 16.61	65 12 25.91	57 33.04	+0.48	0.0057909	742	+14	−3
28	148	4 20 13.17	66 9 58.95	57 32.17	+0.47	0.0058651	728	+14	+1
29	149	4 24 9.72	67 7 31.12	57 31.35	+0.44	0.0059379	711	+10	+5
30	150	4 28 6.28	68 5 2.47	57 30.56	+0.38	0.0060090	694	+ 3	+8
31	151	4 32 2.84	69 2 33.03	57 29.81	+0.28	0.0060784	676	− 6	+9
Juni 1	152	4 35 59.40	70 0 2.84	57 29.08	+0.16	0.0061460	655	−14	+8
2	153	4 39 55.95	70 57 31.92	57 28.35	+0.04	0.0062115	632	−20	+6
3	154	4 43 52.51	71 55 0.27		−0.09	0.0062747		−24	+2

Mittlerer Berliner Mittag.

Monats- und Wochentag			Zeitgleichung M. Zt. — W. Zt.	AR. app.	Diff.	Decl. app.	Diff.	Durchg.-Dauer St.-Zt.	Halbm.
			m s	h m s	m s	° ′ ″	′ ″	s	′ ″
Juni	2	Mo	−2 23.21	4 37 32.74	4 5.92	+22 5 49.5	7 51.5	136.52	15 46.00
	3	Di	2 13.85	4 41 38.66	4 6.31	22 13 41.0	7 28.2	136.63	15 45.86
	4	Mi	2 4.09	4 45 44.97	4 6.67	22 21 9.2	7 4.9	136.73	15 45.73
	5	Do	1 53.97	4 49 51.64	4 7.02	22 28 14.1	6 41.3	136.83	15 45.60
	6	Fr	1 43.51	4 53 58.66	4 7.35	22 34 55.4	6 17.5	136.92	15 45.48
	7	Sa	−1 32.72	4 58 6.01	4 7.65	+22 41 12.9	5 53.8	137.01	15 45.37
	8	So	1 21.62	5 2 13.66	4 7.93	22 47 6.7	5 29.7	137.09	15 45.26
	9	Mo	1 10.25	5 6 21.59	4 8.18	22 52 36.4	5 5.7	137.17	15 45.15
	10	Di	0 58.63	5 10 29.77	4 8.39	22 57 42.1	4 41.4	137.24	15 45.05
	11	Mi	0 46.79	5 14 38.16	4 8.60	23 2 23.5	4 17.1	137.30	15 44.95
	12	Do	−0 34.75	5 18 46.76	4 8.78	+23 6 40.6	3 52.8	137.36	15 44.86
	13	Fr	0 22.53	5 22 55.54	4 8.94	23 10 33.4	3 28.2	137.42	15 44.78
	14	Sa	−0 10.15	5 27 4.48	4 9.08	23 14 1.6	3 3.7	137.47	15 44.70
	15	So	+0 2.37	5 31 13.56	4 9.20	23 17 5.3	2 39.1	137.51	15 44.62
	16	Mo	0 15.02	5 35 22.76	4 9.30	23 19 44.4	2 14.3	137.54	15 44.54
	17	Di	+0 27.76	5 39 32.06	4 9.38	+23 21 58.7	1 49.7	137.57	15 44.47
	18	Mi	0 40.58	5 43 41.44	4 9.43	23 23 48.4	1 24.9	137.59	15 44.40
	19	Do	0 53.46	5 47 50.87	4 9.47	23 25 13.3	1 0.2	137.61	15 44.34
	20	Fr	1 6.37	5 52 0.34	4 9.48	23 26 13.5	0 35.3	137.62	15 44.28
	21	Sa	1 19.29	5 56 9.82	4 9.48	23 26 48.8	0 10.5	137.62	15 44.22
	22	So	+1 32.21	6 0 19.30	4 9.46	+23 26 59.3	0 14.3	137.61	15 44.16
	23	Mo	1 45.12	6 4 28.76	4 9.42	23 26 45.0	0 39.1	137.60	15 44.11
	24	Di	1 57.98	6 8 38.18	4 9.35	23 26 5.9	1 3.9	137.58	15 44.06
	25	Mi	2 10.77	6 12 47.53	4 9.26	23 25 2.0	1 28.6	137.56	15 44.02
	26	Do	2 23.47	6 16 56.79	4 9.15	23 23 33.4	1 53.3	137.53	15 43.98
	27	Fr	+2 36.06	6 21 5.94	4 9.02	+23 21 40.1	2 18.0	137.49	15 43.94
	28	Sa	2 48.53	6 25 14.96	4 8.87	23 19 22.1	2 42.6	137.45	15 43.90
	29	So	3 0.85	6 29 23.83	4 8.70	23 16 39.5	3 7.1	137.40	15 43.87
	30	Mo	3 12.99	6 33 32.53	4 8.51	23 13 32.4	3 31.5	137.34	15 43.84
Juli	1	Di	3 24.94	6 37 41.04	4 8.30	23 10 0.9	3 55.9	137.27	15 43.82
	2	Mi	+3 36.68	6 41 49.34	4 8.06	+23 6 5.0	4 20.2	137.20	15 43.81
	3	Do	3 48.19	6 45 57.40	4 7.78	23 1 44.8	4 44.2	137.13	15 43.80
	4	Fr	3 59.42	6 50 5.18	4 7.49	22 57 0.6	5 8.3	137.05	15 43.80
	5	Sa	4 10.35	6 54 12.67	4 7.17	22 51 52.3	5 32.2	136.96	15 43.80
	6	So	4 20.96	6 58 19.84	4 6.82	22 46 20.1	5 55.8	136.87	15 43.81
	7	Mo	+4 31.23	7 2 26.66	4 6.46	+22 40 24.3	6 19.5	136.77	15 43.82
	8	Di	4 41.13	7 6 33.12	4 6.06	22 34 4.8	6 42.8	136.67	15 43.84
	9	Mi	4 50.63	7 10 39.18	4 5.65	22 27 22.0	7 6.1	136.56	15 43.87
	10	Do	4 59.72	7 14 44.83	4 5.22	22 20 15.9	7 29.1	136.45	15 43.90
	11	Fr	5 8.39	7 18 50.05		22 12 46.8		136.33	15 43.94

Mittlerer Berliner Mittag.

Monats- und Jahrestag			Sternzeit	Mittleres Aequ. 1902.0 Länge	Diff.	Breite	Lg. Rad. v.	Diff.	Nut. ☾ in 0″.01 dλ	dε
			h m s	° ′ ″	′ ″	″				
Juni	2	153	4 39 55.95	70 57 31.92	57 28.35	+0.04	0.0062115	632	—20	+6
	3	154	4 43 52.51	71 55 0.27	57 27.60	—0.09	0.0062747	608	—24	+2
	4	155	4 47 49.06	72 52 27.87	57 26.81	—0.22	0.0063355	584	—23	—2
	5	156	4 51 45.62	73 49 54.68	57 25.96	—0.35	0.0063939	561	—17	—5
	6	157	4 55 42.18	74 47 20.64	57 25.07	—0.46	0.0064500	536	— 9	—8
	7	158	4 59 38.73	75 44 45.71	57 24.13	—0.55	0.0065036	511	+ 2	—9
	8	159	5 3 35.29	76 42 9.84	57 23.15	—0.60	0.0065547	485	+12	—8
	9	160	5 7 31.84	77 39 32.99	57 22.15	—0.62	0.0066032	460	+21	—5
	10	161	5 11 28.40	78 36 55.14	57 21.13	—0.60	0.0066492	438	+26	—2
	11	162	5 15 24.96	79 34 16.27	57 20.12	—0.56	0.0066930	417	+26	+2
	12	163	5 19 21.52	80 31 36.39	57 19.14	—0.50	0.0067347	398	+21	+6
	13	164	5 23 18.07	81 28 55.53	57 18.19	—0.41	0.0067745	380	+14	+8
	14	165	5 27 14.63	82 26 13.72	57 17.30	—0.30	0.0068125	362	+ 4	+9
	15	166	5 31 11.19	83 23 31.02	57 16.48	—0.18	0.0068487	344	— 5	+8
	16	167	5 35 7.74	84 20 47.50	57 15.72	—0.05	0.0068831	328	—12	+5
	17	168	5 39 4.30	85 18 3.22	57 15.02	+0.07	0.0069159	312	—16	+1
	18	169	5 43 0.86	86 15 18.24	57 14.39	+0.19	0.0069471	297	—17	—3
	19	170	5 46 57.41	87 12 32.63	57 13.85	+0.30	0.0069768	283	—13	—6
	20	171	5 50 53.97	88 9 46.48	57 13.38	+0.39	0.0070051	269	— 7	—8
	21	172	5 54 50.53	89 6 59.86	57 12.99	+0.46	0.0070320	254	+ 1	—9
	22	173	5 58 47.09	90 4 12.85	57 12.68	+0.50	0.0070574	239	+ 8	—7
	23	174	6 2 43.64	91 1 25.53	57 12.46	+0.52	0.0070813	223	+13	—4
	24	175	6 6 40.20	91 58 37.99	57 12.32	+0.52	0.0071036	208	+14	0
	25	176	6 10 36.76	92 55 50.31	57 12.24	+0.49	0.0071244	191	+13	+4
	26	177	6 14 33.31	93 53 2.55	57 12.23	+0.44	0.0071435	173	+ 6	+7
	27	178	6 18 29.87	94 50 14.78	57 12.29	+0.35	0.0071608	154	— 3	+9
	28	179	6 22 26.43	95 47 27.07	57 12.40	+0.24	0.0071762	134	— 9	+9
	29	180	6 26 22.98	96 44 39.47	57 12.54	+0.12	0.0071896	113	—19	+7
	30	181	6 30 19.54	97 41 52.01	57 12.71	0.00	0.0072009	91	—24	+4
Juli	1	182	6 34 16.10	98 39 4.72	57 12.89	—0.13	0.0072100	67	—23	0
	2	183	6 38 12.65	99 36 17.61	57 13.05	—0.26	0.0072167	42	—19	—4
	3	184	6 42 9.21	100 33 30.66	57 13.19	—0.37	0.0072209	15	—11	—7
	4	185	6 46 5.77	101 30 43.85	57 13.29	—0.45	0.0072224	11	— 2	—9
	5	186	6 50 2.32	102 27 57.14	57 13.34	—0.50	0.0072213	37	+10	—8
	6	187	6 53 58.88	103 25 10.48	57 13.34	—0.53	0.0072176	65	+18	—6
	7	188	6 57 55.44	104 22 23.82	57 13.29	—0.53	0.0072111	92	+24	—3
	8	189	7 1 51.99	105 19 37.11	57 13.23	—0.50	0.0072019	117	+26	+1
	9	190	7 5 48.55	106 16 50.34	57 13.16	—0.44	0.0071902	142	+24	+5
	10	191	7 9 45.11	107 14 3.50	57 13.09	—0.36	0.0071760	164	+17	+8
	11	192	7 13 41.66	108 11 16.59		—0.25	0.0071596		+ 8	+9

Mittlerer Berliner Mittag.

Monats- und Wochentag			Zeitgleichung M. Zt. — W. Zt.	AR. app.	Diff.	Decl. app.	Diff.	Durchg.-Dauer St.-Zt.	Halbm.
			m s	h m s	m s	° ′ ″	′ ″	s	′ ″
Juli	10	Do	+4 59.72	7 14 44.83	4 5.22	+22 20 15.9	7 29.1	136.45	15 43.90
	11	Fr	5 8.39	7 18 50.05	4 4.77	22 12 46.8	7 52.0	136.33	15 43.94
	12	Sa	5 16.60	7 22 54.82	4 4.30	22 4 54.8	8 14.8	136.21	15 43.98
	13	So	5 24.34	7 26 59.12	4 3.82	21 56 40.0	8 37.3	136.08	15 44.02
	14	Mo	5 31.60	7 31 2.94	4 3.32	21 48 2.7	8 59.6	135.95	15 44.08
	15	Di	+5 38.37	7 35 6.26	4 2.83	+21 39 3.1	9 21.8	135.82	15 44.14
	16	Mi	5 44.64	7 39 9.09	4 2.31	21 29 41.3	9 43.7	135.68	15 44.20
	17	Do	5 50.39	7 43 11.40	4 1.78	21 19 57.6	10 5.4	135.54	15 44.25
	18	Fr	5 55.62	7 47 13.18	4 1.26	21 9 52.2	10 26.9	135.39	15 44.31
	19	Sa	6 0.32	7 51 14.44	4 0.70	20 59 25.3	10 48.2	135.24	15 44.37
	20	So	+6 4.47	7 55 15.14	4 0.15	+20 48 37.1	11 9.3	135.09	15 44.44
	21	Mo	6 8.07	7 59 15.29	3 59.61	20 37 27.8	11 30.1	134.93	15 44.52
	22	Di	6 11.12	8 3 14.90	3 59.04	20 25 57.7	11 50.7	134.77	15 44.60
	23	Mi	6 13.61	8 7 13.94	3 58.48	20 14 7.0	12 11.1	134.61	15 44.68
	24	Do	6 15.53	8 11 12.42	3 57.92	20 1 55.9	12 31.1	134.45	15 44.76
	25	Fr	+6 16.89	8 15 10.34	3 57.34	+19 49 24.8	12 51.1	134.29	15 44.84
	26	Sa	6 17.68	8 19 7.68	3 56.77	19 36 33.7	13 10.6	134.12	15 44.93
	27	So	6 17.90	8 23 4.45	3 56.20	19 23 23.1	13 30.0	133.95	15 45.02
	28	Mo	6 17.54	8 27 0.65	3 55.62	19 9 53.1	13 49.1	133.78	15 45.12
	29	Di	6 16.60	8 30 56.27	3 55.05	18 56 4.0	14 7.9	133.61	15 45.22
	30	Mi	+6 15.09	8 34 51.32	3 54.45	+18 41 56.1	14 26.4	133.44	15 45.33
	31	Do	6 12.99	8 38 45.77	3 53.86	18 27 29.7	14 44.6	133.26	15 45.44
Aug.	1	Fr	6 10.30	8 42 39.63	3 53.28	18 12 45.1	15 2.6	133.08	15 45.56
	2	Sa	6 7.02	8 46 32.91	3 52.67	17 57 42.5	15 20.1	132.90	15 45.68
	3	So	6 3.14	8 50 25.58	3 52.07	17 42 22.4	15 37.4	132.73	15 45.80
	4	Mo	+5 58.65	8 54 17.65	3 51.47	+17 26 45.0	15 54.4	132.56	15 45.93
	5	Di	5 53.56	8 58 9.12	3 50.85	17 10 50.6	16 11.1	132.38	15 46.06
	6	Mi	5 47.86	9 1 59.97	3 50.25	16 54 39.5	16 27.5	132.21	15 46.20
	7	Do	5 41.56	9 5 50.22	3 49.65	16 38 12.0	16 43.5	132.04	15 46.35
	8	Fr	5 34.65	9 9 39.87	3 49.03	16 21 28.5	16 59.2	131.87	15 46.50
	9	Sa	+5 27.13	9 13 28.90	3 48.45	+16 4 29.3	17 14.7	131.70	15 46.65
	10	So	5 19.02	9 17 17.35	3 47.85	15 47 14.6	17 29.8	131.53	15 46.81
	11	Mo	5 10.32	9 21 5.20	3 47.26	15 29 44.8	17 44.6	131.37	15 46.98
	12	Di	5 1.03	9 24 52.46	3 46.69	15 12 0.2	17 59.1	131.21	15 47.15
	13	Mi	4 51.16	9 28 39.15	3 46.10	14 54 1.1	18 13.4	131.05	15 47.32
	14	Do	+4 40.71	9 32 25.25	3 45.54	+14 35 47.7	18 27.3	130.89	15 47.50
	15	Fr	4 29.70	9 36 10.79	3 45.01	14 17 20.4	18 41.0	130.73	15 47.68
	16	Sa	4 18.15	9 39 55.80	3 44.46	13 58 39.4	18 54.2	130.58	15 47.86
	17	So	4 6.06	9 43 40.26	3 43.93	13 39 45.2	19 7.3	130.43	15 48.04
	18	Mo	3 53.44	9 47 24.19		13 20 37.9		130.28	15 48.22

Mittlerer Berliner Mittag.

Monats- und Jahrestag			Sternzeit	Mittleres Aequ. 1902.0 Länge	Diff.	Breite	Lg. Rad. v.	Diff.	Nut. ☾ in 0″.01 dλ	dε
			h m s	° ′ ″	′ ″	″				
Juli	10	191	7 9 45.11	107 14 3.50	57 13.09	−0.36	0.0071760	164	+17	+8
	11	192	7 13 41.66	108 11 16.59	57 13.05	−0.25	0.0071596	186	+ 8	+9
	12	193	7 17 38.22	109 8 29.64	57 13.04	−0.12	0.0071410	206	− 2	+8
	13	194	7 21 34.78	110 5 42.68	57 13.09	+0.01	0.0071204	224	−10	+6
	14	195	7 25 31.33	111 2 55.77	57 13.18	+0.13	0.0070980	242	−16	+2
	15	196	7 29 27.89	112 0 8.95	57 13.33	+0.25	0.0070738	259	−17	−2
	16	197	7 33 24.45	112 57 22.28	57 13.53	+0.36	0.0070479	278	−14	−6
	17	198	7 37 21.00	113 54 35.81	57 13.81	+0.45	0.0070201	295	− 9	−8
	18	199	7 41 17.56	114 51 49.62	57 14.15	+0.52	0.0069906	309	− 1	−9
	19	200	7 45 14.11	115 49 3.77	57 14.58	+0.57	0.0069597	322	+ 6	−8
	20	201	7 49 10.67	116 46 18.35	57 15.09	+0.59	0.0069275	336	+12	−5
	21	202	7 53 7.23	117 43 33.44	57 15.68	+0.59	0.0068939	350	+15	−1
	22	203	7 57 3.78	118 40 49.12	57 16.35	+0.56	0.0068589	364	+14	+2
	23	204	8 1 0.34	119 38 5.47	57 17.12	+0.50	0.0068225	380	+ 8	+6
	24	205	8 4 56.89	120 35 22.59	57 17.96	+0.42	0.0067845	395	0	+8
	25	206	8 8 53.44	121 32 40.55	57 18.87	+0.32	0.0067450	411	− 9	+9
	26	207	8 12 50.00	122 29 59.42	57 19.85	+0.21	0.0067039	428	−17	+7
	27	208	8 16 46.56	123 27 19.27	57 20.88	+0.08	0.0066611	446	−22	+5
	28	209	8 20 43.11	124 24 40.15	57 21.96	−0.06	0.0066165	466	−24	+1
	29	210	8 24 39.67	125 22 2.11	57 23.05	−0.18	0.0065699	485	−22	−3
	30	211	8 28 36.23	126 19 25.16	57 24.15	−0.29	0.0065214	506	−15	−6
	31	212	8 32 32.78	127 16 49.31	57 25.23	−0.37	0.0064708	530	− 6	−9
Aug.	1	213	8 36 29.34	128 14 14.54	57 26.29	−0.43	0.0064178	554	+ 5	−9
	2	214	8 40 25.89	129 11 40.83	57 27.33	−0.46	0.0063624	578	+15	−7
	3	215	8 44 22.44	130 9 8.16	57 28.32	−0.47	0.0063046	603	+23	−4
	4	216	8 48 19.00	131 6 36.48	57 29.25	−0.45	0.0062443	628	+26	0
	5	217	8 52 15.55	132 4 5.73	57 30.12	−0.39	0.0061815	652	+24	+4
	6	218	8 56 12.11	133 1 35.85	57 30.97	−0.30	0.0061163	674	+20	+7
	7	219	9 0 8.66	133 59 6.82	57 31.81	−0.19	0.0060489	695	+11	+9
	8	220	9 4 5.22	134 56 38.63	57 32.65	−0.07	0.0059794	715	+ 1	+9
	9	221	9 8 1.77	135 54 11.28	57 33.51	+0.06	0.0059079	735	− 7	+7
	10	222	9 11 58.33	136 51 44.79	57 34.39	+0.19	0.0058344	754	−14	+3
	11	223	9 15 54.88	137 49 19.18	57 35.29	+0.31	0.0057590	770	−16	0
	12	224	9 19 51.43	138 46 54.47	57 36.22	+0.42	0.0056820	784	−16	−4
	13	225	9 23 47.99	139 44 30.69	57 37.21	+0.51	0.0056036	797	−10	−7
	14	226	9 27 44.54	140 42 7.90	57 38.26	+0.59	0.0055239	811	− 4	−9
	15	227	9 31 41.09	141 39 46.16	57 39.35	+0.64	0.0054428	824	+ 5	−8
	16	228	9 35 37.65	142 37 25.51	57 40.50	+0.67	0.0053604	835	+10	−6
	17	229	9 39 34.20	143 35 6.01	57 41.72	+0.67	0.0052769	844	+14	−3
	18	230	9 43 30.76	144 32 47.73		+0.64	0.0051925		+14	+1

Mittlerer Berliner Mittag.

Monats- und Wochentag		Zeitgleichung M. Zt. — W. Zt.	AR. app.	Diff.	Decl. app.	Diff.	Durchg.-Dauer St.-Zt.	Halbm.
Aug. 17	So	+4m 6.06s	9h 43m 40.26s	3m 43.93s	+13° 39′ 45.2″	19′ 7.3″	130.43s	15′ 48.04″
18	Mo	3 53.44	9 47 24.19	3 43.44	13 20 37.9	19 20.0	130.28	15 48.22
19	Di	3 40.32	9 51 7.63	3 42.93	13 1 17.9	19 32.3	130.13	15 48.41
20	Mi	3 26.70	9 54 50.56	3 42.45	12 41 45.6	19 44.5	129.99	15 48.60
21	Do	3 12.60	9 58 33.01	3 41.99	12 22 1.1	19 56.3	129.85	15 48.79
22	Fr	+2 58.03	10 2 15.00	3 41.54	+12 2 4.8	20 7.9	129.71	15 48.98
23	Sa	2 43.02	10 5 56.54	3 41.11	11 41 56.9	20 19.0	129.58	15 49.18
24	So	2 27.57	10 9 37.65	3 40.69	11 21 37.9	20 29.9	129.45	15 49.38
25	Mo	2 11.71	10 13 18.34	3 40.31	11 1 8.0	20 40.6	129.32	15 49.58
26	Di	1 55.46	10 16 58.65	3 39.91	10 40 27.4	20 50.7	129.20	15 49.79
27	Mi	+1 38.82	10 20 38.56	3 39.54	+10 19 36.7	21 0.8	129.08	15 50.00
28	Do	1 21.81	10 24 18.10	3 39.19	9 58 35.9	21 10.3	128.97	15 50.20
29	Fr	1 4.45	10 27 57.29	3 38.86	9 37 25.6	21 19.6	128.86	15 50.40
30	Sa	0 46.75	10 31 36.15	3 38.51	9 16 6.0	21 28.5	128.75	15 50.62
31	So	0 28.71	10 35 14.66	3 38.20	8 54 37.5	21 37.1	128.65	15 50.84
Sept. 1	Mo	+0 10.36	10 38 52.86	3 37.89	+ 8 33 0.4	21 45.4	128.56	15 51.06
2	Di	—0 8.30	10 42 30.75	3 37.61	8 11 15.0	21 53.2	128.47	15 51.28
3	Mi	0 27.25	10 46 8.36	3 37.32	7 49 21.8	22 0.8	128.38	15 51.51
4	Do	0 46.48	10 49 45.68	3 37.06	7 27 21.0	22 8.0	128.30	15 51.74
5	Fr	1 5.97	10 53 22.74	3 36.80	7 5 13.0	22 14.9	128.23	15 51.99
6	Sa	—1 25.72	10 56 59.54	3 36.56	+ 6 42 58.1	22 21.5	128.16	15 52.24
7	So	1 45.71	11 0 36.10	3 36.35	6 20 36.6	22 27.6	128.10	15 52.49
8	Mo	2 5.92	11 4 12.45	3 36.14	5 58 9.0	22 33.5	128.04	15 52.74
9	Di	2 26.33	11 7 48.59	3 35.97	5 35 35.5	22 39.1	127.99	15 52.99
10	Mi	2 46.92	11 11 24.56	3 35.79	5 12 56.4	22 44.3	127.94	15 53.24
11	Do	—3 7.67	11 15 0.35	3 35.65	+ 4 50 12.1	22 49.2	127.90	15 53.49
12	Fr	3 28.57	11 18 36.00	3 35.53	4 27 22.9	22 53.8	127.87	15 53.74
13	Sa	3 49.59	11 22 11.53	3 35.43	4 4 29.1	22 58.0	127.84	15 54.00
14	So	4 10.72	11 25 46.96	3 35.34	3 41 31.1	23 2.0	127.82	15 54.26
15	Mo	4 31.93	11 29 22.30	3 35.28	3 18 29.1	23 5.6	127.80	15 54.52
16	Di	—4 53.20	11 32 57.58	3 35.24	+ 2 55 23.5	23 9.0	127.79	15 54.78
17	Mi	5 14.51	11 36 32.82	3 35.23	2 32 14.5	23 11.9	127.78	15 55.04
18	Do	5 35.84	11 40 8.05	3 35.24	2 9 2.6	23 14.7	127.78	15 55.30
19	Fr	5 57.15	11 43 43.29	3 35.28	1 45 47.9	23 17.0	127.79	15 55.56
20	Sa	6 18.42	11 47 18.57	3 35.34	1 22 30.9	23 19.0	127.80	15 55.82
21	So	—6 39.63	11 50 53.91	3 35.42	+ 0 59 11.9	23 20.8	127.81	15 56.08
22	Mo	7 0.76	11 54 29.33	3 35.53	0 35 51.1	23 22.1	127.83	15 56.34
23	Di	7 21.78	11 58 4.86	3 35.66	+ 0 12 29.0	23 23.3	127.86	15 56.60
24	Mi	7 42.67	12 1 40.52	3 35.80	— 0 10 54.3	23 23.9	127.90	15 56.86
25	Do	8 3.42	12 5 16.32		0 34 18.2		127.94	15 57.13

Mittlerer Berliner Mittag.

Monats- und Jahrestag		Sternzeit	Mittleres Aequ. 1902.0 Länge	Diff.	Breite	Lg. Rad. v.	Diff.	Nut. ☾ in 0″.01 dλ	dε
		h m s	° ′ ″	′ ″	″				
Aug. 17	229	9 39 34.20	143 35 6.01	57 41.72	+0.67	0.0052769	844	+14	−3
18	230	9 43 30.76	144 32 47.73	57 43.03	+0.64	0.0051925	854	+14	+1
19	231	9 47 27.31	145 30 30.76	57 44.42	+0.58	0.0051071	864	+11	+5
20	232	9 51 23.86	146 28 15.18	57 45.88	+0.50	0.0050207	872	+ 3	+8
21	233	9 55 20.42	147 26 1.06	57 47.43	+0.40	0.0049335	881	− 6	+9
22	234	9 59 16.97	148 23 48.49	57 49.06	+0.29	0.0048454	891	−14	+8
23	235	10 3 13.52	149 21 37.55	57 50.76	+0.16	0.0047563	902	−22	+6
24	236	10 7 10.08	150 19 28.31	57 52.53	+0.02	0.0046661	913	−25	+2
25	237	10 11 6.63	151 17 20.84	57 54.35	−0.11	0.0045748	924	−23	−2
26	238	10 15 3.18	152 15 15.19	57 56.20	−0.22	0.0044824	937	−18	−6
27	239	10 18 59.74	153 13 11.39	57 58.06	−0.31	0.0043887	951	−10	−8
28	240	10 22 56.29	154 11 9.45	57 59.91	−0.38	0.0042936	968	+ 2	−9
29	241	10 26 52.84	155 9 9.36	58 1.76	−0.42	0.0041968	985	+11	−8
30	242	10 30 49.39	156 7 11.12	58 3.58	−0.43	0.0040983	1003	+21	−5
31	243	10 34 45.95	157 5 14.70	58 5.34	−0.41	0.0039980	1020	+25	−1
Sept. 1	244	10 38 42.50	158 3 20.04	58 7.05	−0.35	0.0038960	1038	+26	+3
2	245	10 42 39.05	159 1 27.09	58 8.72	−0.26	0.0037922	1055	+21	+6
3	246	10 46 35.60	159 59 35.81	58 10.34	−0.15	0.0036867	1073	+14	+8
4	247	10 50 32.16	160 57 46.15	58 11.92	−0.03	0.0035794	1090	+ 5	+9
5	248	10 54 28.71	161 55 58.07	58 13.48	+0.10	0.0034704	1105	− 5	+7
6	249	10 58 25.26	162 54 11.55	58 15.02	+0.24	0.0033599	1118	−12	+5
7	250	11 2 21.81	163 52 26.57	58 16.54	+0.37	0.0032481	1130	−16	+1
8	251	11 6 18.37	164 50 43.11	58 18.06	+0.49	0.0031351	1141	−16	−3
9	252	11 10 14.92	165 49 1.17	58 19.61	+0.60	0.0030210	1151	−12	−7
10	253	11 14 11.47	166 47 20.78	58 21.17	+0.68	0.0029059	1159	− 6	−9
11	254	11 18 8.02	167 45 41.95	58 22.75	+0.73	0.0027900	1166	+ 3	−9
12	255	11 22 4.57	168 44 4.70	58 24.36	+0.76	0.0026734	1173	+ 9	−7
13	256	11 26 1.12	169 42 29.06	58 26.02	+0.77	0.0025561	1178	+14	−4
14	257	11 29 57.68	170 40 55.08	58 27.73	+0.75	0.0024383	1181	+15	0
15	258	11 33 54.23	171 39 22.81	58 29.48	+0.70	0.0023202	1184	+14	+4
16	259	11 37 50.78	172 37 52.29	58 31.29	+0.63	0.0022018	1185	+ 5	+7
17	260	11 41 47.33	173 36 23.58	58 33.17	+0.54	0.0020833	1185	− 3	+9
18	261	11 45 43.89	174 34 56.75	58 35.15	+0.42	0.0019648	1184	−12	+9
19	262	11 49 40.44	175 33 31.90	58 37.21	+0.28	0.0018464	1185	−19	+7
20	263	11 53 36.99	176 32 9.11	58 39.34	+0.15	0.0017279	1187	−24	+3
21	264	11 57 33.54	177 30 48.45	58 41.52	+0.03	0.0016092	1188	−24	−1
22	265	12 1 30.09	178 29 29.97	58 43.75	−0.09	0.0014904	1189	−21	−5
23	266	12 5 26.64	179 28 13.72	58 46.03	−0.20	0.0013715	1192	−12	−7
24	267	12 9 23.19	180 26 59.75	58 48.33	−0.28	0.0012523	1197	− 2	−9
25	268	12 13 19.75	181 25 48.08		−0.32	0.0011326		+ 9	−8

Mittlerer Berliner Mittag.

Monats- und Wochentag		Zeitgleichung M. Zt. — W. Zt.	AR. app.	Diff.	Decl. app.	Diff.	Durchg.-Dauer St.-Zt.	Halbm.
		m s	h m s	m s	° ′ ″	′ ″	s	′ ″
Sept. 24	Mi	— 7 42.67	12 1 40.52	3 35.80	— 0 10 54.3	23 23.9	127.90	15 56.86
25	Do	8 3.42	12 5 16.32	3 35.98	0 34 18.2	23 24.4	127.94	15 57.13
26	Fr	8 24.00	12 8 52.30	3 36.17	0 57 42.6	23 24.5	127.99	15 57.40
27	Sa	8 44.38	12 12 28.47	3 36.38	1 21 7.1	23 24.1	128.04	15 57.66
28	So	9 4.55	12 16 4.85	3 36.61	1 44 31.2	23 23.3	128.10	15 57.93
29	Mo	— 9 24.49	12 19 41.46	3 36.85	— 2 7 54.5	23 22.3	128.17	15 58.20
30	Di	9 44.20	12 23 18.31	3 37.10	2 31 16.8	23 20.9	128.24	15 58.47
Oct. 1	Mi	10 3.65	12 26 55.41	3 37.37	2 54 37.7	23 19.0	128.32	15 58.74
2	Do	10 22.82	12 30 32.78	3 37.68	3 17 56.7	23 16.8	128.41	15 59.02
3	Fr	10 41.70	12 34 10.46	3 37.99	3 41 13.5	23 14.3	128.50	15 59.30
4	Sa	—11 0.27	12 37 48.45	3 38.31	— 4 4 27.8	23 11.4	128.60	15 59.58
5	So	11 18.51	12 41 26.76	3 38.65	4 27 39.2	23 8.0	128.70	15 59.86
6	Mo	11 36.41	12 45 5.41	3 39.02	4 50 47.2	23 4.4	128.81	16 0.14
7	Di	11 53.94	12 48 44.43	3 39.39	5 13 51.6	23 0.4	128.92	16 0.42
8	Mi	12 11.10	12 52 23.82	3 39.80	5 36 52.0	22 56.0	129.04	16 0.70
9	Do	—12 27.86	12 56 3.62	3 40.21	— 5 59 48.0	22 51.2	129.17	16 0.98
10	Fr	12 44.20	12 59 43.83	3 40.65	6 22 39.2	22 46.0	129.30	16 1.26
11	Sa	13 0.10	13 3 24.48	3 41.11	6 45 25.2	22 40.6	129.44	16 1.55
12	So	13 15.55	13 7 5.59	3 41.57	7 8 5.8	22 34.7	129.58	16 1.83
13	Mo	13 30.52	13 10 47.16	3 42.08	7 30 40.5	22 28.4	129.73	16 2.10
14	Di	—13 45.00	13 14 29.24	3 42.59	— 7 53 8.9	22 21.8	129.88	16 2.38
15	Mi	13 58.96	13 18 11.83	3 43.12	8 15 30.7	22 14.8	130.04	16 2.66
16	Do	14 12.39	13 21 54.95	3 43.69	8 37 45.5	22 7.5	130.20	16 2.94
17	Fr	14 25.25	13 25 38.64	3 44.28	8 59 53.0	21 59.8	130.37	16 3.21
18	Sa	14 37.53	13 29 22.92	3 44.88	9 21 52.8	21 51.7	130.54	16 3.48
19	So	—14 49.20	13 33 7.80	3 45.50	— 9 43 44.5	21 43.3	130.72	16 3.74
20	Mo	15 0.25	13 36 53.30	3 46.15	10 5 27.8	21 34.5	130.90	16 4.00
21	Di	15 10.66	13 40 39.45	3 46.82	10 27 2.3	21 25.3	131.09	16 4.27
22	Mi	15 20.40	13 44 26.27	3 47.50	10 48 27.6	21 15.7	131.28	16 4.54
23	Do	15 29.44	13 48 13.77	3 48.21	11 9 43.3	21 5.7	131.47	16 4.80
24	Fr	—15 37.78	13 52 1.98	3 48.91	—11 30 49.0	20 55.4	131.67	16 5.06
25	Sa	15 45.42	13 55 50.89	3 49.65	11 51 44.4	20 44.6	131.87	16 5.32
26	So	15 52.33	13 59 40.54	3 50.39	12 12 29.0	20 33.4	132.07	16 5.57
27	Mo	15 58.50	14 3 30.93	3 51.13	12 33 2.4	20 21.8	132.28	16 5.83
28	Di	16 3.92	14 7 22.06	3 51.90	12 53 24.2	20 9.7	132.49	16 6.08
29	Mi	—16 8.57	14 11 13.96	3 52.67	—13 13 33.9	19 57.3	132.71	16 6.34
30	Do	16 12.45	14 15 6.63	3 53.43	13 33 31.2	19 44.5	132.93	16 6.59
31	Fr	16 15.57	14 19 0.06	3 54.22	13 53 15.7	19 31.2	133.15	16 6.84
Nov. 1	Sa	16 17.91	14 22 54.28	3 55.00	14 12 46.9	19 17.5	133.38	16 7.10
2	So	16 19.46	14 26 49.28		14 32 4.4		133.61	16 7.35

Mittlerer Berliner Mittag.

Monats- und Jahrestag		Sternzeit	Mittleres Aequ. 1902.0 Länge	Diff.	Breite	Lg. Rad. v.	Diff	Nut. ☾ in 0".01 dλ	dε
		h m s	° ′ ″	′ ″	″				
Sept. 24	267	12 9 23.19	180 26 59.75	58 48.33	−0.28	0.0012523	1197	− 2	−9
25	268	12 13 19.75	181 25 48.08	58 50.63	−0.32	0.0011326	1201	+ 9	−8
26	269	12 17 16.30	182 24 38.71	58 52.92	−0.33	0.0010125	1207	+18	−6
27	270	12 21 12.85	183 23 31.63	58 55.18	−0.32	0.0008918	1215	+23	−3
28	271	12 25 9.40	184 22 26.81	58 57.41	−0.28	0.0007703	1223	+25	+1
29	272	12 29 5.95	185 21 24.22	58 59.57	−0.20	0.0006480	1230	+23	+5
30	273	12 33 2.51	186 20 23.79	59 1.68	−0.09	0.0005250	1237	+17	+8
Oct. 1	274	12 36 59.06	187 19 25.47	59 3.73	+0.03	0.0004013	1245	+ 8	+9
2	275	12 40 55.61	188 18 29.20	59 5.71	+0.16	0.0002768	1254	+ 4	+9
3	276	12 44 52.16	189 17 34.91	59 7.65	+0.30	0.0001514	1261	−10	+6
4	277	12 48 48.72	190 16 42.56	59 9.55	+0.43	0.0000253	1266	−15	+2
5	278	12 52 45.27	191 15 52.11	59 11.41	+0.55	9.9998987	1270	−16	−2
6	279	12 56 41.82	192 15 3.52	59 13.23	+0.66	9.9997717	1274	−13	−6
7	280	13 0 38.37	193 14 16.75	59 15.02	+0.75	9.9996443	1275	− 7	−8
8	281	13 4 34.92	194 13 31.77	59 16.81	+0.81	9.9995168	1275	+ 1	−9
9	282	13 8 31.48	195 12 48.58	59 18.60	+0.85	9.9993893	1274	+ 8	−8
10	283	13 12 28.03	196 12 7.18	59 20.39	+0.86	9.9992619	1272	+14	−5
11	284	13 16 24.58	197 11 27.57	59 22.17	+0.84	9.9991347	1270	+15	−1
12	285	13 20 21.13	198 10 49.74	59 23.97	+0.80	9.9990077	1265	+13	+3
13	286	13 24 17.68	199 10 13.71	59 25.78	+0.73	9.9988812	1258	+ 9	+6
14	287	13 28 14.24	200 9 39.49	59 27.63	+0.64	9.9987554	1249	0	+8
15	288	13 32 10.79	201 9 7.12	59 29.53	+0.52	9.9986305	1241	− 9	+9
16	289	13 36 7.34	202 8 36.65	59 31.51	+0.39	9.9985064	1231	−17	+7
17	290	13 40 3.89	203 8 8.16	59 33.56	+0.25	9.9983833	1220	−24	+5
18	291	13 44 0.45	204 7 41.72	59 35.67	+0.11	9.9982613	1209	−25	+1
19	292	13 47 57.00	205 7 17.39	59 37.83	−0.02	9.9981404	1199	−23	−3
20	293	13 51 53.55	206 6 55.22	59 40.04	−0.13	9.9980205	1188	−16	−7
21	294	13 55 50.11	207 6 35.26	59 42.31	−0.22	9.9979017	1179	− 6	−9
22	295	13 59 46.66	208 6 17.57	59 44.61	−0.28	9.9977838	1172	+ 5	−9
23	296	14 3 43.21	209 6 2.18	59 46.89	−0.30	9.9976666	1164	+14	−7
24	297	14 7 39.76	210 5 49.07	59 49.16	−0.29	9.9975502	1158	+22	−4
25	298	14 11 36.32	211 5 38.23	59 51.40	−0.25	9.9974344	1153	+25	0
26	299	14 15 32.87	212 5 29.63	59 53.62	−0.18	9.9973191	1149	+24	+4
27	300	14 19 29.42	213 5 23.25	59 55.78	−0.09	9.9972042	1145	+18	+7
28	301	14 23 25.98	214 5 19.03	59 57.86	+0.02	9.9970897	1142	+11	+9
29	302	14 27 22.53	215 5 16.89	59 59.87	+0.15	9.9969755	1139	+ 2	+9
30	303	14 31 19.08	216 5 16.76	60 1.81	+0.29	9.9968616	1136	− 7	+7
31	304	14 35 15.64	217 5 18.57	60 3.68	+0.43	9.9967480	1133	−13	+3
Nov. 1	305	14 39 12.19	218 5 22.25	60 5.49	+0.55	9.9966347	1129	−15	−1
2	306	14 43 8.75	219 5 27.74		+0.66	9.9965218		−15	−5

Mittlerer Berliner Mittag.

Monats- und Wochentag			Zeitgleichung M. Zt. — W. Zt.	AR. app.	Diff.	Decl. app.	Diff.	Durchg.-Dauer St.-Zt.	Halbm.
			m s	h m s	m s	° ′ ″	′ ″	s	′ ″
Nov.	1	Sa	—16 17.91	14 22 54.28	3 55.00	—14 12 46.9	19 17.5	133.38	16 7.10
	2	So	16 19.46	14 26 49.28	3 55.81	14 32 4.4	19 3.3	133.61	16 7.35
	3	Mo	16 20.21	14 30 45.09	3 56.60	14 51 7.7	18 48.8	133.84	16 7.60
	4	Di	16 20.16	14 34 41.69	3 57.41	15 9 56.5	18 33.9	134.07	16 7.85
	5	Mi	16 19.31	14 38 39.10	3 58.22	15 28 30.4	18 18.6	134.30	16 8.09
	6	Do	—16 17.65	14 42 37.32	3 59.03	—15 46 49.0	18 2.8	134.54	16 8.34
	7	Fr	16 15.17	14 46 36.35	3 59.86	16 4 51.8	17 46.6	134.78	16 8.58
	8	Sa	16 11.87	14 50 36.21	4 0.66	16 22 38.4	17 30.0	135.02	16 8.82
	9	So	16 7.75	14 54 36.87	4 1.49	16 40 8.4	17 13.0	135.26	16 9.06
	10	Mo	16 2.82	14 58 38.36	4 2.32	16 57 21.4	16 55.7	135.50	16 9.30
	11	Di	—15 57.06	15 2 40.68	4 3.16	—17 14 17.1	16 37.9	135.74	16 9.54
	12	Mi	15 50.46	15 6 43.84	4 3.99	17 30 55.0	16 19.8	135.98	16 9.77
	13	Do	15 43.02	15 10 47.83	4 4.84	17 47 14.8	16 1.2	136.22	16 10.00
	14	Fr	15 34.73	15 14 52.67	4 5.68	18 3 16.0	15 42.3	136.46	16 10.22
	15	Sa	15 25.61	15 18 58.35	4 6.51	18 18 58.3	15 22.9	136.69	16 10.43
	16	So	—15 15.65	15 23 4.86	4 7.36	—18 34 21.2	15 3.2	136.92	16 10.64
	17	Mo	15 4.85	15 27 12.22	4 8.20	18 49 24.4	14 43.2	137.15	16 10.85
	18	Di	14 53.20	15 31 20.42	4 9.06	19 4 7.6	14 22.7	137.38	16 11.05
	19	Mi	14 40.70	15 35 29.48	4 9.90	19 18 30.3	14 1.9	137.61	16 11.25
	20	Do	14 27.36	15 39 39.38	4 10.74	19 32 32.2	13 40.8	137.84	16 11.44
	21	Fr	—14 13.18	15 43 50.12	4 11.56	—19 46 13.0	13 19.2	138.07	16 11.62
	22	Sa	13 58.16	15 48 1.68	4 12.40	19 59 32.2	12 57.3	138.29	16 11.80
	23	So	13 42.32	15 52 14.08	4 13.20	20 12 29.5	12 35.1	138.51	16 11.98
	24	Mo	13 25.68	15 56 27.28	4 13.99	20 25 4.6	12 12.4	138.72	16 12.16
	25	Di	13 8.24	16 0 41.27	4 14.78	20 37 17.0	11 49.5	138.93	16 12.34
	26	Mi	—12 50.02	16 4 56.05	4 15.53	—20 49 6.5	11 26.2	139.14	16 12.51
	27	Do	12 31.04	16 9 11.58	4 16.28	21 0 32.7	11 2.5	139.34	16 12.68
	28	Fr	12 11.32	16 13 27.86	4 17.00	21 11 35.2	10 38.5	139.54	16 12.85
	29	Sa	11 50.88	16 17 44.86	4 17.69	21 22 13.7	10 14.3	139.73	16 13.02
	30	So	11 29.74	16 22 2.55	4 18.38	21 32 28.0	9 49.7	139.92	16 13.18
Dec.	1	Mo	—11 7.92	16 26 20.93	4 19.04	—21 42 17.7	9 24.8	140.10	16 13.34
	2	Di	10 45.44	16 30 39.97	4 19.66	21 51 42.5	8 59.6	140.28	16 13.50
	3	Mi	10 22.33	16 34 59.63	4 20.27	22 0 42.1	8 34.2	140.45	16 13.65
	4	Do	9 58.62	16 39 19.90	4 20.84	22 9 16.3	8 8.4	140.61	16 13.80
	5	Fr	9 34.34	16 43 40.74	4 21.39	22 17 24.7	7 42.5	140.77	16 13.94
	6	Sa	— 9 9.51	16 48 2.13	4 21.91	—22 25 7.2	7 16.3	140.92	16 14.08
	7	So	8 44.15	16 52 24.04	4 22.41	22 32 23.5	6 49.8	141.06	16 14.22
	8	Mo	8 18.30	16 56 46.45	4 22.87	22 39 13.3	6 23.2	141.20	16 14.35
	9	Di	7 51.98	17 1 9.32	4 23.32	22 45 36.5	5 56.3	141.33	16 14.48
	10	Mi	7 25.22	17 5 32.64		22 51 32.8		141.45	16 14.61

Mittlerer Berliner Mittag.

Monats- und Jahrestag			Sternzeit h m s	Mittleres Aequ. 1902.0 Länge ° ′ ″	Diff. ′ ″	Breite ″	Lg. Rad. v.	Diff.	Nut. ☾ in 0″.01 dλ	dε
Nov.	1	305	14 39 12.19	218 5 22.25	60 5.49	+0.55	9.9966347	1129	−15	−1
	2	306	14 43 8.75	219 5 27.74	60 7.23	+0.66	9.9965218	1124	−15	−5
	3	307	14 47 5.30	220 5 34.97	60 8.91	+0.75	9.9964094	1117	− 9	−7
	4	308	14 51 1.85	221 5 43.88	60 10.55	+0.82	9.9962977	1110	− 2	−9
	5	309	14 54 58.41	222 5 54.43	60 12.13	+0.87	9.9961867	1103	+ 6	−8
	6	310	14 58 54.96	223 6 6.56	60 13.67	+0.89	9.9960764	1094	+12	−6
	7	311	15 2 51.52	224 6 20.23	60 15.17	+0.89	9.9959670	1083	+15	−3
	8	312	15 6 48.07	225 6 35.40	60 16.64	+0.85	9.9958587	1071	+15	+1
	9	313	15 10 44.62	226 6 52.04	60 18.10	+0.78	9.9957516	1058	+11	+5
	10	314	15 14 41.18	227 7 10.14	60 19.54	+0.69	9.9956458	1043	+ 3	+8
	11	315	15 18 37.74	228 7 29.68	60 20.98	+0.58	9.9955415	1026	− 6	+9
	12	316	15 22 34.29	229 7 50.66	60 22.43	+0.46	9.9954389	1009	−15	+8
	13	317	15 26 30.85	230 8 13.09	60 23.92	+0.33	9.9953380	990	−22	+6
	14	318	15 30 27.40	231 8 37.01	60 25.45	+0.20	9.9952390	969	−25	+2
	15	319	15 34 23.96	232 9 2.46	60 27.02	+0.07	9.9951421	948	−24	−2
	16	320	15 38 20.51	233 9 29.48	60 28.66	−0.05	9.9950473	926	−19	−6
	17	321	15 42 17.07	234 9 58.14	60 30.35	−0.15	9.9949547	905	−10	−8
	18	322	15 46 13.62	235 10 28.49	60 32.08	−0.23	9.9948642	885	+ 1	−9
	19	323	15 50 10.18	236 11 0.57	60 33.84	−0.27	9.9947757	865	+11	−8
	20	324	15 54 6.74	237 11 34.41	60 35.61	−0.28	9.9946892	846	+20	−5
	21	325	15 58 3.29	238 12 10.02	60 37.37	−0.26	9.9946046	829	+24	−1
	22	326	16 1 59.84	239 12 47.39	60 39.11	−0.21	9.9945217	813	+24	+3
	23	327	16 5 56.40	240 13 26.50	60 40.80	−0.13	9.9944404	798	+21	+6
	24	328	16 9 52.96	241 14 7.30	60 42.43	−0.02	9.9943606	783	+14	+8
	25	329	16 13 49.51	242 14 49.73	60 44.00	+0.10	9.9942823	770	+ 5	+9
	26	330	16 17 46.07	243 15 33.73	60 45.49	+0.22	9.9942053	757	− 4	+7
	27	331	16 21 42.63	244 16 19.22	60 46.91	+0.34	9.9941296	744	−12	+5
	28	332	16 25 39.18	245 17 6.13	60 48.25	+0.46	9.9940552	731	−15	+1
	29	333	16 29 35.74	246 17 54.38	60 49.52	+0.57	9.9939821	718	−15	−3
	30	334	16 33 32.29	247 18 43.90	60 50.70	+0.67	9.9939103	706	−10	−7
Dec.	1	335	16 37 28.85	248 19 34.60	60 51.78	+0.75	9.9938397	693	− 4	−9
	2	336	16 41 25.41	249 20 26.38	60 52.79	+0.81	9.9937704	678	+ 4	−9
	3	337	16 45 21.96	250 21 19.17	60 53.74	+0.84	9.9937026	663	+10	−7
	4	338	16 49 18.52	251 22 12.91	60 54.61	+0.84	9.9936363	648	+15	−4
	5	339	16 53 15.08	252 23 7.52	60 55.43	+0.82	9.9935715	631	+15	0
	6	340	16 57 11.63	253 24 2.95	60 56.18	+0.77	9.9935084	613	+12	+4
	7	341	17 1 8.19	254 24 59.13	60 56.87	+0.69	9.9934471	594	+ 6	+7
	8	342	17 5 4.75	255 25 56.00	60 57.52	+0.58	9.9933877	574	− 3	+9
	9	343	17 9 1.30	256 26 53.52	60 58.14	+0.46	9.9933303	553	−12	+9
	10	344	17 12 57.86	257 27 51.66		+0.33	9.9932750		−20	+7

2*

Mittlerer Berliner Mittag.

Monats- und Wochentag		Zeitgleichung M. Zt. — W. Zt.	AR. app.	Diff.	Decl. app.	Diff.	Durchg.-Dauer St.-Zt.	Halbm.
		m s	h m s	m s	° ′ ″	′ ″	s	′ ″
Dec. 9	Di	—7 51.98	17 1 9.32	4 23.32	—22 45 36.5	5 56.3	141.33	16 14.48
10	Mi	7 25.22	17 5 32.64	4 23.74	22 51 32.8	5 29.3	141.45	16 14.61
11	Do	6 58.04	17 9 56.38	4 24.12	22 57 2.1	5 2.0	141.56	16 14.73
12	Fr	6 30.48	17 14 20.50	4 24.47	23 2 4.1	4 34.6	141.66	16 14.84
13	Sa	6 2.56	17 18 44.97	4 24.80	23 6 38.7	4 7.1	141.76	16 14.95
14	So	—5 34.32	17 23 9.77	4 25.11	—23 10 45.8	3 39.4	141.86	16 15.06
15	Mo	5 5.77	17 27 34.88	4 25.39	23 14 25.2	3 11.5	141.94	16 15.15
16	Di	4 36.94	17 32 0.27	4 25.64	23 17 36.7	2 43.6	142.01	16 15.24
17	Mi	4 7.85	17 36 25.91	4 25.87	23 20 20.3	2 15.6	142.07	16 15.32
18	Do	3 38.54	17 40 51.78	4 26.06	23 22 35.9	1 47.5	142.12	16 15.40
19	Fr	—3 9.04	17 45 17.84	4 26.23	—23 24 23.4	1 19.4	142.16	16 15.46
20	Sa	2 39.37	17 49 44.07	4 26.36	23 25 42.8	0 51.1	142.19	16 15.52
21	So	2 9.57	17 54 10.43	4 26.45	23 26 33.9	0 22.8	142.22	16 15.58
22	Mo	1 39.67	17 58 36.88	4 26.51	23 26 56.7	——— 0 5.4	142.23	16 15.64
23	Di	1 9.71	18 3 3.39	4 26.55	23 26 51.3	0 33.7	142.24	16 15.68
24	Mi	—0 39.72	18 7 29.94	4 26.54	—23 26 17.6	1 2.1	142.24	16 15.72
25	Do	—0 9.74	18 11 56.48	4 26.49	23 25 15.5	1 30.3	142.22	16 15.76
26	Fr	+0 20.19	18 16 22.97	4 26.40	23 23 45.2	1 58.5	142.20	16 15.80
27	Sa	0 50.03	18 20 49.37	4 26.28	23 21 46.7	2 26.6	142.17	16 15.84
28	So	1 19.75	18 25 15.65	4 26.12	23 19 20.1	2 54.8	142.13	16 15.86
29	Mo	+1 49.32	18 29 41.77	4 25.93	—23 16 25.3	3 22.8	142.08	16 15.88
30	Di	2 18.69	18 34 7.70	4 25.69	23 13 2.5	3 50.7	142.02	16 15.90
31	Mi	2 47.82	18 38 33.39	4 25.43	23 9 11.8	4 18.4	141.95	16 15.92
32	Do	3 16.69	18 42 58.82	4 25.13	23 4 53.4	4 46.1	141.88	16 15.94
33	Fr	3 45.26	18 47 23.95		23 0 7.3		141.81	16 15.96

			h
Frühjahrs-Aequinoctium	März	21	2
Sommer-Solstitium	Juni	21	22
Herbst-Aequinoctium	Sept.	23	13
Winter-Solstitium	Dec.	22	7

Mittlerer Berliner Mittag.

Monats- und	Jahrestag	Sternzeit	Mittleres Aequ. 1902.0 Länge	Diff.	Breite	Lg. Rad. v.	Diff.	Nut. ☾ in 0″.01 dλ	dε
		h m s	° ′ ″	′ ″	″				
Dec. 9	343	17 9 1.30	256 26 53.52	60 58.14	+0.46	9.9933303	553	−12	+9
10	344	17 12 57.86	257 27 51.66	60 58.73	+0.33	9.9932750	529	−20	+7
11	345	17 16 54.42	258 28 50.39	60 59.32	+0.19	9.9932221	504	−25	+3
12	346	17 20 50.98	259 29 49.71	60 59.92	+0.05	9.9931717	478	−25	−1
13	347	17 24 47.53	260 30 49.63	61 0.55	−0.07	9.9931239	450	−21	−5
14	348	17 28 44.09	261 31 50.18	61 1.21	−0.17	9.9930789	422	−13	−7
15	349	17 32 40.65	262 32 51.39	61 1.92	−0.24	9.9930367	395	− 3	−9
16	350	17 36 37.20	263 33 53.31	61 2.69	−0.29	9.9929972	366	+ 8	−8
17	351	17 40 33.76	264 34 56.00	61 3.50	−0.31	9.9929606	338	+17	−6
18	352	17 44 30.32	265 35 59.50	61 4.33	−0.30	9.9929268	312	+24	−3
19	353	17 48 26.88	266 37 3.83	61 5.14	−0.26	9.9928956	287	+25	+1
20	354	17 52 23.44	267 38 8.97	61 5.95	−0.18	9.9928669	263	+23	+5
21	355	17 56 19.99	268 39 14.92	61 6.73	−0.08	9.9928406	241	+15	+8
22	356	18 0 16.55	269 40 21.65	61 7.46	+0.03	9.9928165	219	+ 8	+9
23	357	18 4 13.11	270 41 29.11	61 8.13	+0.15	9.9927946	199	− 2	+8
24	358	18 8 9.66	271 42 37.24	61 8.73	+0.28	9.9927747	180	−10	+6
25	359	18 12 6.22	272 43 45.97	61 9.25	+0.40	9.9927567	161	−14	+2
26	360	18 16 2.78	273 44 55.22	61 9.70	+0.51	9.9927406	143	−15	−2
27	361	18 19 59.34	274 46 4.92	61 10.07	+0.61	9.9927263	125	−13	−6
28	362	18 23 55.89	275 47 14.99	61 10.34	+0.69	9.9927138	109	− 6	−8
29	363	18 27 52.45	276 48 25.33	61 10.53	+0.74	9.9927029	91	+ 2	−9
30	364	18 31 49.01	277 49 35.86	61 10.65	+0.76	9.9926938	74	+ 9	−8
31	365	18 35 45.57	278 50 46.51	61 10.67	+0.76	9.9926864	56	+15	−5
32	366	18 39 42.13	279 51 57.18	61 10.61	+0.73	9.9926808	39	+16	−1
33	367	18 43 38.68	280 53 7.79		+0.68	9.9926769		+14	+3

Perigaeum	Jan.	0	20h
Apogaeum	Juli	4	2

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	*X*	Diff.	Red. auf 1900.0	*Y*	Diff.	Red. auf 1900.0	*Z*	Diff.	Red. auf 1900.0
	+			—			—		
Jan. 0.0	0.155 6482	86290		0.890 6327	13067		0.386 3767	5671	
0.5	0.164 2772	86165	—4725	0.889 3260	13758	— 733	0.385 8096	5971	—319
1.0	0.172 8937	86034		0.887 9502	14449		0.385 2125	6272	
1.5	0.181 4971	85897	4710	0.886 5053	15141	810	0.384 5853	6571	353
2.0	0.190 0868	85753		0.884 9912	15831		0.383 9282	6871	
2.5	0.198 6621	85602	4693	0.883 4081	16522	887	0.383 2411	7170	386
3.0	0.207 2223	85444		0.881 7559	17210		0.382 5241	7469	
3.5	0.215 7667	85278	4675	0.880 0349	17896	963	0.381 7772	7767	420
4.0	0.224 2945	85105		0.878 2453	18580		0.381 0005	8064	
4.5	0.232 8050	84926	4655	0.876 3873	19265	1039	0.380 1941	8361	453
	+			—			—		
5.0	0.241 2976	84740		0.874 4608	19949		0.379 3580	8658	
5.5	0.249 7716	84549	—4634	0.872 4659	20630	—1115	0.378 4922	8953	—486
6.0	0.258 2265	84350		0.870 4029	21311		0.377 5969	9247	
6.5	0.266 6615	84143	4612	0.868 2718	21989	1190	0.376 6722	9541	519
7.0	0.275 0758	83929		0.866 0729	22667		0.375 7181	9835	
7.5	0.283 4687	83710	4588	0.863 8062	23342	1265	0.374 7346	10129	552
8.0	0.291 8397	83483		0.861 4720	24016		0.373 7217	10421	
8.5	0.300 1880	83248	4563	0.859 0704	24689	1340	0.372 6796	10712	584
9.0	0.308 5128	83007		0.856 6015	25360		0.371 6084	11003	
9.5	0.316 8135	82760	4537	0.854 0655	26027	1415	0.370 5081	11292	616
	+			—			—		
10.0	0.325 0895	82505		0.851 4628	26693		0.369 3789	11581	
10.5	0.333 3400	82244	—4509	0.848 7935	27356	—1489	0.368 2208	11868	—648
11.0	0.341 5644	81975		0.846 0579	28016		0.367 0340	12154	
11.5	0.349 7619	81701	4480	0.843 2563	28675	1562	0.365 8186	12440	680
12.0	0.357 9320	81420		0.840 3888	29331		0.364 5746	12724	
12.5	0.366 0740	81131	4449	0.837 4557	29983	1635	0.363 3022	13006	712
13.0	0.374 1871	80837		0.834 4574	30634		0.362 0016	13288	
13.5	0.382 2708	80535	4417	0.831 3940	31282	1707	0.360 6728	13568	743
14.0	0.390 3243	80228		0.828 2658	31926		0.359 3160	13848	
14.5	0.398 3471	79913	4383	0.825 0732	32569	1779	0.357 9312	14126	774
	+			—			—		
15.0	0.406 3384	79593		0.821 8163	33208		0.356 5186	14403	
15.5	0.414 2977	79267	—4348	0.818 4955	33844	—1850	0.355 0783	14679	—805
16.0	0.422 2244	78935		0.815 1111	34477		0.353 6104	14953	
16.5	0.430 1179	78597	4311	0.811 6634	35106	1921	0.352 1151	15226	836
17.0	0.437 9776	78253		0.808 1528	35732		0.350 5925	15497	
17.5	0.445 8029	77903	4274	0.804 5796	36354	1991	0.349 0428	15768	866
18.0	0.453 5932	77548		0.800 9442	36973		0.347 4660	16036	
18.5	0.461 3480	77187	4235	0.797 2469	37589	2060	0.345 8624	16304	896
19.0	0.469 0667			0.793 4880			0.344 2320		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	*X*		Red. auf 1900.0	*Y*		Red. auf 1900.0	*Z*		Red. auf 1900.0
	+			−			−		
Jan. 19.0	0.469 0667	76820		0.793 4880	38201		0.344 2320	16570	
19.5	0.476 7487	76448	−4194	0.789 6679	38811	−2129	0.342 5750	16834	−926
20.0	0.484 3935	76070		0.785 7868	39417		0.340 8916	17097	
20.5	0.492 0005	75687	4153	0.781 8451	40020	2198	0.339 1819	17359	956
21.0	0.499 5692	75299		0.777 8431	40620		0.337 4460	17619	
21.5	0.507 0991	74905	4110	0.773 7811	41217	2265	0.335 6841	17878	985
22.0	0.514 5896	74507		0.769 6594	41809		0.333 8963	18136	
22.5	0.522 0403	74103	4066	0.765 4785	42398	2331	0.332 0827	18392	1014
23.0	0.529 4506	73694		0.761 2387	42985		0.330 2435	18647	
23.5	0.536 8200		4020	0.756 9402		2397	0.328 3788		1043
	+	73281		−	43568		−	18902	
24.0	0.544 1481	72862		0.752 5834	44149		0.326 4886	19154	
24.5	0.551 4343	72437	−3973	0.748 1685	44727	−2463	0.324 5732	19404	−1072
25.0	0.558 6780	72008		0.743 6958	45301		0.322 6328	19654	
25.5	0.565 8788	71573	3925	0.739 1657	45871	2528	0.320 6674	19901	1100
26.0	0.573 0361	71133		0.734 5786	46439		0.318 6773	20147	
26.5	0.580 1494	70687	3875	0.729 9347	47002	2592	0.316 6626	20393	1127
27.0	0.587 2181	70236		0.725 2345	47563		0.314 6233	20636	
27.5	0.594 2417	69781	3825	0.720 4782	48121	2655	0.312 5597	20879	1155
28.0	0.601 2198	69319		0.715 6661	48676		0.310 4718	21119	
28.5	0.608 1517		3774	0.710 7985		2717	0.308 3599		1182
	+	68851		−	49227		−	21359	
29.0	0.615 0368	68379		0.705 8758	49774		0.306 2240	21596	
29.5	0.621 8747	67901	−3722	0.700 8984	50318	−2778	0.304 0644	21832	−1209
30.0	0.628 6648	67418		0.695 8666	50858		0.301 8812	22067	
30.5	0.635 4066	66930	3668	0.690 7808	51395	2839	0.299 6745	22300	1235
31.0	0.642 0996	66436		0.685 6413	51927		0.297 4445	22530	
31.5	0.648 7432	65937	3613	0.680 4486	52456	2899	0.295 1915	22759	1261
Febr. 1.0	0.655 3369	65433		0.675 2030	52981		0.292 9156	22987	
1.5	0.661 8802	64924	3557	0.669 9049	53501	2957	0.290 6169	23212	1287
2.0	0.668 3726	64409		0.664 5548	54017		0.288 2957	23436	
2.5	0.674 8135		3500	0.659 1531		3015	0.285 9521		1312
	+	63889		−	54529		−	23659	
3.0	0.681 2024	63364		0.653 7002	55037		0.283 5862	23879	
3.5	0.687 5388	62833	−3441	0.648 1965	55541	−3071	0.281 1983	24097	−1337
4.0	0.693 8221	62298		0.642 6424	56040		0.278 7886	24313	
4.5	0.700 0519	61757	3382	0.637 0384	56536	3127	0.276 3573	24529	1361
5.0	0.706 2276	61211		0.631 3848	57027		0.273 9044	24741	
5.5	0.712 3487	60662	3322	0.625 6821	57513	3182	0.271 4303	24952	1385
6.0	0.718 4149	60107		0.619 9308	57994		0.268 9351	25160	
6.5	0.724 4256	59545	3261	0.614 1314	58471	3236	0.266 4191	25366	1409
7.0	0.730 3801			0.608 2843			0.263 8825		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
	+			—			—		
Febr. 7.0	0.730 3801	58980		0.608 2843	58943		0.263 8825	25570	
7.5	0.736 2781	58410	—3198	0.602 3900	59410	—3289	0.261 3255	25773	—1432
8.0	0.742 1191	57835		0.596 4490	59872		0.258 7482	25973	
8.5	0.747 9026	57256	3135	0.590 4618	60330	3341	0.256 1509	26171	1455
9.0	0.753 6282	56673		0.584 4288	60781		0.253 5338	26367	
9.5	0.759 2955	56084	3071	0.578 3507	61228	3392	0.250 8971	26559	1477
10.0	0.764 9039	55492		0.572 2279	61670		0.248 2412	26751	
10.5	0.770 4531	54896	3006	0.566 0609	62105	3442	0.245 5661	26940	1498
11.0	0.775 9427	54295		0.559 8504	62536		0.242 8721	27127	
11.5	0.781 3722	53690	2939	0.553 5968	62961	3491	0.240 1594	27311	1519
	+			—			—		
12.0	0.786 7412	53079		0.547 3007	63381		0.237 4283	27493	
12.5	0.792 0491	52467	—2872	0.540 9626	63796	—3539	0.234 6790	27672	—1540
13.0	0.797 2958	51851		0.534 5830	64205		0.231 9118	27849	
13.5	0.802 4809	51230	2804	0.528 1625	64610	3586	0.229 1269	28025	1560
14.0	0.807 6039	50607		0.521 7015	65008		0.226 3244	28197	
14.5	0.812 6646	49981	2735	0.515 2007	65399	3632	0.223 5047	28368	1580
15.0	0.817 6627	49351		0.508 6608	65786		0 220 6679	28536	
15.5	0.822 5978	48718	2665	0.502 0822	66167	3676	0.217 8143	28701	1599
16.0	0.827 4696	48082		0.495 4655	66543		0.214 9442	28864	
16.5	0.832 2778	47443	2595	0.488 8112	66913	3719	0.212 0578	29026	1618
	+			—			—		
17.0	0.837 0221	46801		0.482 1199	67279		0.209 1552	29185	
17.5	0.841 7022	46155	—2524	0.475 3920	67639	—3761	0.206 2367	29340	—1636
18.0	0.846 3177	45507		0.468 6281	67994		0.203 3027	29495	
18.5	0.850 8684	44858	2452	0.461 8287	68343	3802	0.200 3532	29648	1654
19.0	0.855 3542	44205		0.454 9944	68688		0.197 3884	29797	
19.5	0.859 7747	43549	2379	0.448 1256	69027	3841	0.194 4087	29945	1670
20.0	0.864 1296	42891		0.441 2229	69361		0.191 4142	30091	
20.5	0.868 4187	42230	2305	0.434 2868	69690	3880	0.188 4051	30233	1687
21.0	0.872 6417	41566		0.427 3178	70014		0.185 3818	30374	
21.5	0.876 7983	40899	2231	0.420 3164	70332	3918	0.182 3444	30513	1704
	+			—			—		
22.0	0.880 8882	40230		0.413 2832	70646		0.179 2931	30649	
22.5	0.884 9112	39558	—2156	0.406 2186	70954	—3955	0.176 2282	30784	—1720
23.0	0.888 8670	38883		0.399 1232	71258		0.173 1498	30916	
23.5	0.892 7553	38206	2080	0.391 9974	71557	3990	0.170 0582	31044	1735
24.0	0.896 5759	37526		0.384 8417	71850		0.166 9538	31172	
24.5	0.900 3285	36844	2004	0.377 6567	72139	4024	0.163 8366	31298	1750
25.0	0.904 0129	36159		0.370 4428	72422		0.160 7068	31421	
25.5	0.907 6288	35470	1928	0.363 2006	72699	4056	0.157 5647	31541	1764
26.0	0.911 1758			0.355 9307			0.154 4106		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
	+			—			—		
Febr. 26.0	0.911 1758	34779		0.355 9307	72972		0.154 4106	31660	
26.5	0.914 6537	34087	—1851	0.348 6335	73239	—4088	0.151 2446	31776	—1778
27.0	0.918 0624	33391		0.341 3096	73501		0.148 0670	31889	
27.5	0.921 4015	32693	1773	0.333 9595	73757	4118	0.144 8781	32001	1791
28.0	0.924 6708	31993		0.326 5838	74008		0.141 6780	32109	
28.5	0.927 8701	31290	1695	0.319 1830	74254	4147	0.138 4671	32216	1804
März 1.0	0.930 9991	30586		0.311 7576	74493		0.135 2455	32320	
1.5	0.934 0577	29878	1616	0.304 3083	74727	4174	0.132 0135	32421	1816
2.0	0.937 0455	29166		0.296 8356	74956		0.128 7714	32520	
2.5	0.939 9621		1537	0.289 3400		4201	0.125 5194		1827
	+	28452		—	75179		—	32616	
3.0	0.942 8073	27737		0.281 8221	75396		0.122 2578	32710	
3.5	0.945 5810	27020	—1457	0.274 2825	75608	—4226	0.118 9868	32802	—1838
4.0	0.948 2830	26302		0.266 7217	75814		0.115 7066	32891	
4.5	0.950 9132	25580	1376	0.259 1403	76014	4250	0.112 4175	32977	1848
5.0	0.953 4712	24857		0.251 5389	76208		0.109 1198	33061	
5.5	0.955 9569	24132	1295	0.243 9181	76397	4272	0.105 8137	33142	1858
6.0	0.958 3701	23404		0.236 2784	76579		0.102 4995	33221	
6.5	0.960 7105	22675	1214	0.228 6205	76755	4293	0.099 1774	33297	1867
7.0	0.962 9780	21943		0.220 9450	76925		0.095 8477	33371	
7.5	0.965 1723		1132	0.213 2525		4313	0.092 5106		1876
	+	21210		—	77088		—	33441	
8.0	0.967 2933	20475		0.205 5437	77246		0.089 1665	33509	
8.5	0.969 3408	19738	—1050	0.197 8191	77397	—4331	0.085 8156	33575	—1884
9.0	0.971 3146	19001		0.190 0794	77542		0.082 4581	33638	
9.5	0.973 2147	18263	968	0.182 3252	77681	4349	0.079 0943	33697	1892
10.0	0.975 0410	17523		0.174 5571	77813		0.075 7246	33754	
10.5	0.976 7933	16782	885	0.166 7758	77938	4365	0.072 3492	33809	1899
11.0	0.978 4715	16040		0.158 9820	78058		0.068 9683	33860	
11.5	0.980 0755	15298	802	0.151 1762	78172	4380	0.065 5823	33909	1905
12.0	0.981 6053	14554		0.143 3590	78279		0.062 1914	33955	
12.5	0.983 0607		719	0.135 5311		4393	0.058 7959		1911
	+	13809		—	78379		—	33998	
13.0	0.984 4416	13065		0.127 6932	78473		0.055 3961	34039	
13.5	0.985 7481	12320	— 636	0.119 8459	78560	—4405	0.051 9922	34076	—1916
14.0	0.986 9801	11574		0.111 9899	78640		0.048 5846	34111	
14.5	0.988 1375	10829	553	0.104 1259	78716	4416	0.045 1735	34145	1921
15.0	0.989 2204	10084		0.096 2543	78784		0.041 7590	34175	
15.5	0.990 2288	9338	469	0.088 3759	78845	4426	0.038 3415	34202	1925
16.0	0.991 1626	8593		0.080 4914	78902		0.034 9213	34227	
16.5	0.992 0219	7848	385	0.072 6012	78952	4434	0.031 4986	34249	1928
17.0	0.992 8067			0.064 7060			0.028 0737		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
	+			—			—		
März 17.0	0.992 8067	7103		0.064 7060	78997		0.028 0737	34268	
17.5	0.993 5170	6359	— 301	0.056 8063	79035	—4440	0.024 6469	34286	—1931
18.0	0.994 1529	5615		0.048 9028	79068		0.021 2183	34300	
18.5	0.994 7144	4872	216	0.040 9960	79096	4445	0.017 7883	34312	1933
19.0	0.995 2016	4129		0.033 0864	79117		0.014 3571	34322	
19.5	0.995 6145	3386	132	0.025 1747	79132	4449	0.010 9249	34329	1935
20.0	0.995 9531	2643		0.017 2615	79143		0.007 4920	34334	
20.5	0.996 2174	1901	— 48	0.009 3472	79147	4452	0.004 0586	34336	1936
21.0	0.996 4075			0.001 4325			0.000 6250		
	+	1159		+	79146		+	34336	
21.5	0.996 5234		+ 36	0.006 4821		4453	0.002 8086		1937
	+	417		+	79139		+	34334	
22.0	0.996 5651	323		0.014 3960	79127		0.006 2420	34329	
22.5	0.996 5328	1063	+ 120	0.022 3087	79109	—4453	0.009 6749	34321	—1937
23.0	0.996 4265	1803		0.030 2196	79086		0.013 1070	34311	
23.5	0.996 2462	2541	204	0.038 1282	79057	4452	0.016 5381	34300	1936
24.0	0.995 9921	3280		0.046 0339	79024		0.019 9681	34285	
24.5	0.995 6641	4020	288	0.053 9363	78984	4449	0.023 3966	34268	1935
25.0	0.995 2621	4758		0.061 8347	78939		0.026 8234	34248	
25.5	0.994 7863	5495	372	0.069 7286	78889	4445	0.030 2482	34227	1934
26.0	0.994 2368	6232		0.077 6175	78833		0.033 6709	34203	
26.5	0.993 6136		456	0.085 5008		4440	0.037 0912		1932
	+	6969		+	78771		+	34176	
27.0	0.992 9167	7706		0.093 3779	78704		0.040 5088	34146	
27.5	0.992 1461	8441	+ 540	0.101 2483	78631	—4434	0.043 9234	34115	—1929
28.0	0.991 3020	9176		0.109 1114	78553		0.047 3349	34081	
28.5	0.990 3844	9911	623	0.116 9667	78470	4426	0.050 7430	34044	1925
29.0	0.989 3933	10644		0.124 8137	78380		0.054 1474	34005	
29.5	0.988 3289	11377	706	0.132 6517	78285	4416	0.057 5479	33964	1921
30.0	0.987 1912	12108		0.140 4802	78184		0.060 9443	33920	
30.5	0.985 9804	12838	789	0.148 2986	78077	4405	0.064 3363	33873	1916
31.0	0.984 6966	13568		0.156 1063	77965		0.067 7236	33824	
31.5	0.983 3398		872	0.163 9028		4392	0.071 1060		1911
	+	14297		+	77847		+	33773	
April 1.0	0.981 9101	15025		0.171 6875	77723		0.074 4833	33719	
1.5	0.980 4076	15753	+ 955	0.179 4598	77594	—4379	0.077 8552	33662	—1905
2.0	0.978 8323	16479		0.187 2192	77459		0.081 2214	33603	
2.5	0.977 1844	17203	1037	0.194 9651	77318	4365	0.084 5817	33542	1899
3.0	0.975 4641	17927		0.202 6969	77171		0.087 9359	33478	
3.5	0.973 6714	18650	1119	0.210 4140	77019	4350	0.091 2837	33410	1892
4.0	0.971 8064	19370		0.218 1159	76860		0.094 6247	33341	
4.5	0.969 8694	20090	1201	0.225 8019	76696	4334	0.097 9588	33270	1885
5.0	0.967 8604			0.233 4715			0.101 2858		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
	+			+			+		
April 5.0	0.967 8604	20808		0.233 4715	76525		0.101 2858	33196	
5.5	0.965 7796	21526	+1282	0.241 1240	76349	−4316	0.104 6054	33119	−1877
6.0	0.963 6270	22241		0.248 7589	76166		0.107 9173	33040	
6.5	0.961 4029	22954	1363	0.256 3755	75978	4296	0.111 2213	32957	1869
7.0	0.959 1075	23665		0.263 9733	75783		0.114 5170	32873	
7.5	0.956 7410	24374	1443	0.271 5516	75582	4275	0.117 8043	32786	1860
8.0	0.954 3036	25081		0.279 1098	75375		0.121 0829	32696	
8.5	0.951 7955	25785	1523	0.286 6473	75163	4252	0.124 3525	32603	1850
9.0	0.949 2170	26487		0.294 1636	74944		0.127 6128	32508	
9.5	0.946 5683	27186	1603	0.301 6580	74720	4229	0.130 8636	32411	1840
	+			+			+		
10.0	0.943 8497	27883		0.309 1300	74490		0.134 1047	32311	
10.5	0.941 0614	28577	+1683	0.316 5790	74254	−4205	0.137 3358	32209	−1829
11.0	0.938 2037	29269		0.324 0044	74013		0.140 5567	32104	
11.5	0.935 2768	29957	1762	0.331 4057	73765	4179	0.143 7671	31998	1818
12.0	0.932 2811	30642		0.338 7822	73512		0.146 9669	31888	
12.5	0.929 2169	31325	1840	0.346 1334	73255	4151	0.150 1557	31777	1806
13.0	0.926 0844	32004		0.353 4589	72991		0.153 3334	31663	
13.5	0.922 8840	32680	1917	0.360 7580	72723	4123	0.156 4997	31546	1794
14.0	0.919 6160	33352		0.368 0303	72449		0.159 6543	31428	
14.5	0.916 2808	34021	1994	0.375 2752	72170	4094	0.162 7971	31308	1781
	+			+			+		
15.0	0.912 8787	34687		0.382 4922	71887		0.165 9279	31185	
15.5	0.909 4100	35351	+2071	0.389 6809	71598	−4064	0.169 0464	31060	−1768
16.0	0.905 8749	36010		0.396 8407	71305		0.172 1524	30933	
16.5	0.902 2739	36667	2147	0.403 9712	71007	4032	0.175 2457	30805	1754
17.0	0.898 6072	37320		0.411 0719	70704		0.178 3262	30674	
17.5	0.894 8752	37969	2222	0.418 1423	70397	3999	0.181 3936	30541	1740
18.0	0.891 0783	38616		0.425 1820	70085		0.184 4477	30406	
18.5	0.887 2167	39260	2296	0.432 1905	69768	3965	0.187 4883	30269	1725
19.0	0.883 2907	39901		0.439 1673	69447		0.190 5152	30130	
19.5	0.879 3006	40538	2370	0.446 1120	69121	3930	0.193 5282	29989	1710
	+			+			+		
20.0	0.875 2468	41172		0.453 0241	68791		0.196 5271	29846	
20.5	0.871 1296	41803	+2443	0.459 9032	68457	−3893	0.199 5117	29701	−1694
21.0	0.866 9493	42430		0.466 7489	68117		0.202 4818	29554	
21.5	0.862 7063	43055	2516	0.473 5606	67774	3855	0.205 4372	29405	1677
22.0	0.858 4008	43676		0.480 3380	67426		0.208 3777	29254	
22.5	0.854 0332	44295	2588	0.487 0806	67074	3816	0.211 3031	29102	1660
23.0	0.849 6037	44910		0.493 7880	66717		0.214 2133	28947	
23.5	0.845 1127	45522	2659	0.500 4597	66356	3776	0.217 1080	28790	1643
24.0	0.840 5605			0.507 0953			0.219 9870		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
	+			+			+		
April 24.0	0.840 5605	46130		0.507 0953	65990		0.219 9870	28631	
24.5	0.835 9475	46735	+2729	0.513 6943	65620	−3735	0.222 8501	28470	−1625
25.0	0.831 2740	47337		0.520 2563	65245		0.225 6971	28307	
25.5	0.826 5403	47936	2799	0.526 7808	64866	3693	0.228 5278	28142	1607
26.0	0.821 7467	48531		0.533 2674	64483		0.231 3420	27976	
26.5	0.816 8936	49122	2868	0.539 7157	64094	3650	0.234 1396	27807	1588
27.0	0.811 9814	49710		0.546 1251	63701		0.236 9203	27637	
27.5	0.807 0104	50295	2936	0.552 4952	63306	3606	0.239 6840	27464	1569
28.0	0.801 9809	50876		0.558 8258	62904		0.242 4304	27290	
28.5	0.796 8933		3003	0.565 1162		3561	0.245 1594		1549
	+	51455		+	62498		+	27114	
29.0	0.791 7478	52029		0.571 3660	62088		0.247 8708	26936	
29.5	0.786 5449	52599	+3069	0.577 5748	61674	−3514	0.250 5644	26755	−1529
30.0	0.781 2850	53166		0.583 7422	61255		0.253 2399	26573	
30.5	0.775 9684	53731	3134	0.589 8677	60832	3467	0.255 8972	26390	1508
Mai 1.0	0.770 5953	54291		0.595 9509	60404		0.258 5362	26203	
1.5	0.765 1662	54846	3198	0.601 9913	59971	3420	0.261 1565	26014	1487
2.0	0.759 6816	55398		0.607 9884	59534		0.263 7579	25825	
2.5	0.754 1418	55947	3262	0.613 9418	59093	3371	0.266 3404	25633	1466
3.0	0.748 5471	56491		0.619 8511	58647		0.268 9037	25439	
3.5	0.742 8980		3324	0.625 7158		3321	0.271 4476		1444
	+	57031		+	58196		+	25244	
4.0	0.737 1949	57567		0.631 5354	57742		0.273 9720	25046	
4.5	0.731 4382	58098	+3386	0.637 3096	57282	−3270	0.276 4766	24847	−1422
5.0	0.725 6284	58625		0.643 0378	56818		0.278 9613	24645	
5.5	0.719 7659	59147	3447	0.648 7196	56350	3218	0.281 4258	24442	1400
6.0	0.713 8512	59665		0.654 3546	55877		0.283 8700	24237	
6.5	0.707 8847	60179	3506	0.659 9423	55399	3164	0.286 2937	24029	1377
7.0	0.701 8668	60688		0.665 4822	54918		0.288 6966	23821	
7.5	0.695 7980	61191	3564	0.670 9740	54433	3110	0.291 0787	23610	1353
8.0	0.689 6789	61690		0.676 4173	53944		0.293 4397	23398	
8.5	0.683 5099		3622	0.681 8117		3055	0.295 7795		1329
	+	62183		+	53450		+	23185	
9.0	0.677 2916	62671		0.687 1567	52952		0.298 0980	22969	
9.5	0.671 0245	63154	+3679	0.692 4519	52451	−3000	0.300 3949	22751	−1305
10.0	0.664 7091	63631		0.697 6970	51945		0.302 6700	22532	
10.5	0.658 3460	64104	3734	0.702 8915	51436	2943	0.304 9232	22312	1280
11.0	0.651 9356	64571		0.708 0351	50923		0.307 1544	22090	
11.5	0.645 4785	65032	3789	0.713 1274	50408	2885	0.309 3634	21867	1255
12.0	0.638 9753	65489		0.718 1682	49889		0.311 5501	21642	
12.5	0.632 4264	65940	3842	0.723 1571	49367	2827	0.313 7143	21416	1229
13.0	0.625 8324			0.728 0938			0.315 8559		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902		X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
		+			+			+		
Mai	13.0	0.625 8324	66386		0.728 0938	48842		0.315 8559	21189	
	13.5	0.619 1938	66827	+3894	0.732 9780	48314	—2768	0.317 9748	20960	—1203
	14.0	0.612 5111	67262		0.737 8094	47783		0.320 0708	20730	
	14.5	0.605 7849	67693	3945	0.742 5877	47249	2709	0.322 1438	20499	1177
	15.0	0.599 0156	68118		0.747 3126	46713		0.324 1937	20267	
	15.5	0.592 2038	68537	3995	0.751 9839	46175	2648	0.326 2204	20033	1151
	16.0	0.585 3501	68951		0.756 6014	45633		0.328 2237	19799	
	16.5	0.578 4550	69361	4044	0.761 1647	45087	2586	0.330 2036	19562	1124
	17.0	0.571 5189	69766		0.765 6734	44539		0.332 1598	19325	
	17.5	0.564 5423		4092	0.770 1273		2524	0.334 0923		1097
		+	70165		+	43990		+	19087	
	18.0	0.557 5258	70560		0.774 5263	43437		0.336 0010	18847	
	18.5	0.550 4698	70949	+4139	0.778 8700	42881	—2461	0.337 8857	18606	—1070
	19.0	0.543 3749	71334		0.783 1581	42324		0.339 7463	18364	
	19.5	0.536 2415	71713	4184	0.787 3905	41764	2397	0.341 5827	18121	1042
	20.0	0.529 0702	72088		0.791 5669	41202		0.343 3948	17877	
	20.5	0.521 8614	72457	4228	0.795 6871	40636	2333	0.345 1825	17632	1014
	21.0	0.514 6157	72822		0.799 7507	40068		0.346 9457	17386	
	21.5	0.507 3335	73182	4271	0.803 7575	39499	2268	0.348 6843	17139	986
	22.0	0.500 0153	73536		0.807 7074	38927		0.350 3982	16890	
	22.5	0.492 6617		4313	0.811 6001		2202	0.352 0872		958
		+	73886		+	38351		+	16640	
	23.0	0.485 2731	74230		0.815 4352	37774		0.353 7512	16389	
	23.5	0.477 8501	74569	+4353	0.819 2126	37194	—2136	0.355 3901	16137	— 929
	24.0	0.470 3932	74903		0.822 9320	36611		0.357 0038	15884	
	24.5	0.462 9029	75233	4391	0.826 5931	36026	2070	0.358 5922	15631	900
	25.0	0.455 3796	75558		0.830 1957	35439		0.360 1553	15376	
	25.5	0.447 8238	75876	4429	0.833 7396	34849	2003	0.361 6929	15119	871
	26.0	0.440 2362	76190		0.837 2245	34257		0.363 2048	14862	
	26.5	0.432 6172	76500	4466	0.840 6502	33662	1935	0.364 6910	14604	841
	27.0	0.424 9672	76804		0.844 0164	33065		0.366 1514	14345	
	27.5	0.417 2868		4501	0.847 3229		1866	0.367 5859		811
		+	77103		+	32467		+	14084	
	28.0	0.409 5765	77397		0.850 5696	31866		0.368 9943	13823	
	28.5	0.401 8368	77685	+4535	0.853 7562	31262	—1797	0.370 3766	13561	— 781
	29.0	0.394 0683	77969		0.856 8824	30655		0.371 7327	13297	
	29.5	0.386 2714	78246	4568	0.859 9479	30047	1728	0.373 0624	13033	751
	30.0	0.378 4468	78519		0.862 9526	29436		0.374 3657	12768	
	30.5	0.370 5949	78785	4600	0.865 8962	28823	1658	0.375 6425	12501	720
	31.0	0.362 7164	79046		0.868 7785	28207		0.376 8926	12234	
	31.5	0.354 8118	79303	4630	0.871 5992	27590	1587	0.378 1160	11966	690
Juni	1.0	0.346 8815			0.874 3582			0.379 3126		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
	+			+			+		
Juni 1.0	0.346 8815	79553		0.874 3582	26970		0.379 3126	11697	
1.5	0.338 9262	79798	+4659	0.877 0552	26348	−1516	0.380 4823	11426	−659
2.0	0.330 9464	80037		0.879 6900	25722		0.381 6249	11155	
2.5	0.322 9427	80269	4687	0.882 2622	25095	1444	0.382 7404	10883	628
3.0	0.314 9158	80496		0.884 7717	24466		0.383 8287	10610	
3.5	0.306 8662	80718	4714	0.887 2183	23834	1372	0.384 8897	10336	597
4.0	0.298 7944	80933		0.889 6017	23201		0.385 9233	10062	
4.5	0.290 7011	81140	4739	0.891 9218	22567	1300	0.386 9295	9786	566
5.0	0.282 5871	81342		0.894 1785	21930		0.387 9081	9511	
5.5	0.274 4529		4762	0.896 3715		1227	0.388 8592		534
	+	81538		+	21292		+	9234	
6.0	0.266 2991	81727		0.898 5007	20652		0.389 7826	8957	
6.5	0.258 1264	81911	+4784	0.900 5659	20011	−1154	0.390 6783	8679	−502
7.0	0.249 9353	82087		0.902 5670	19368		0.391 5462	8401	
7.5	0.241 7266	82257	4805	0.904 5038	18723	1081	0.392 3863	8121	470
8.0	0.233 5009	82421		0.906 3761	18078		0.393 1984	7842	
8.5	0.225 2588	82578	4824	0.908 1839	17432	1008	0.393 9826	7562	438
9.0	0.217 0010	82729		0.909 9271	16785		0.394 7388	7282	
9.5	0.208 7281	82875	4843	0.911 6056	16138	934	0.395 4670	7001	406
10.0	0.200 4406	83013		0.913 2194	15489		0.396 1671	6720	
10.5	0.192 1393		4860	0.914 7683		860	0.396 8391		374
	+	83144		+	14840		+	6439	
11.0	0.183 8249	83270		0.916 2523	14191		0.397 4830	6158	
11.5	0.175 4979	83391	+4875	0.917 6714	13541	− 785	0.398 0988	5876	−342
12.0	0.167 1588	83505		0.919 0255	12891		0.398 6864	5595	
12.5	0.158 8083	83612	4889	0.920 3146	12241	711	0.399 2459	5313	309
13.0	0.150 4471	83714		0.921 5387	11590		0.399 7772	5031	
13.5	0.142 0757	83812	4901	0.922 6977	10939	636	0.400 2803	4749	276
14.0	0.133 6945	83902		0.923 7916	10288		0.400 7552	4466	
14.5	0.125 3043	83986	4912	0.924 8204	9636	561	0.401 2018	4183	243
15.0	0.116 9057	84065		0.925 7840	8984		0.401 6201	3901	
15.5	0.108 4992		4922	0.926 6824		486	0.402 0102		210
	+	84139		+	8332		+	3618	
16.0	0.100 0853	84206		0.927 5156	7679		0.402 3720	3335	
16.5	0.091 6647	84268	+4930	0.928 2835	7027	− 411	0.402 7055	3051	−177
17.0	0.083 2379	84324		0.928 9862	6374		0.403 0106	2768	
17.5	0.074 8055	84375	4937	0.929 6236	5721	335	0.403 2874	2485	145
18.0	0.066 3680	84420		0.930 1957	5067		0.403 5359	2202	
18.5	0.057 9260	84458	4943	0.930 7024	4415	259	0.403 7561	1918	112
19.0	0.049 4802	84492		0.931 1439	3763		0.403 9479	1635	
19.5	0.041 0310	84520	4948	0.931 5202	3109	184	0.404 1114	1351	89
20.0	0.032 5790			0.931 8311			0.404 2465		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
	+			+			+		
Juni 20.0	0.032 5790	84542		0.931 8311	2456		0.404 2465	1067	
20.5	0.024 1248	84560	+4951	0.932 0767	1803	— 108	0.404 3532	784	— 56
21.0	0.015 6688	84571		0.932 2570	1149		0.404 4316	500	
21.5	0.007 2117		4952	0.932 3719		— 33	0.404 4816		— 14
	—	84577		+	496		+	216	
22.0	0.001 2460	84577		0.932 4215	158		0.404 5032	68	
22.5	0.009 7037	84571	4952	0.932 4057	812	+ 43	0.404 4964	352	+ 19
23.0	0.018 1608	84560		0.932 3245	1465		0.404 4612	635	
23.5	0.026 6168	84544	4951	0.932 1780	2119	118	0.404 3977	920	52
24.0	0.035 0712	84522		0.931 9661	2772		0.404 3057	1204	
24.5	0.043 5234		4948	0.931 6889		193	0.404 1853		85
	—	84493		+	3426		+	1487	
25.0	0.051 9727	84460		0.931 3463	4080		0.404 0366	1771	
25.5	0.060 4187	84421	+4945	0.930 9383	4733	+ 269	0.403 8595	2055	+117
26.0	0.068 8608	84376		0.930 4650	5387		0.403 6540	2339	
26.5	0.077 2984	84325	4940	0.929 9263	6040	344	0.403 4201	2623	150
27.0	0.085 7309	84269		0.929 3223	6694		0.403 1578	2906	
27.5	0.094 1578	84207	4933	0.928 6529	7347	419	0.402 8672	3190	183
28.0	0.102 5785	84139		0.927 9182	8000		0.402 5482	3474	
28.5	0.110 9924	84065	4925	0.927 1182	8653	495	0.402 2008	3757	216
29.0	0.119 3989	83985		0.926 2529	9306		0.401 8251	4041	
29.5	0.127 7974		4915	0.925 3223		570	0.401 4210		248
	—	83899		+	9960		+	4324	
30.0	0.136 1873	83807		0.924 3263	10612		0.400 9886	4607	
30.5	0.144 5680	83709	+4904	0.923 2651	11265	+ 645	0.400 5279	4890	+281
Juli 1.0	0.152 9389	83604		0.922 1386	11916		0.400 0389	5173	
1.5	0.161 2993	83494	4892	0.920 9470	12568	720	0.399 5216	5455	314
2.0	0.169 6487	83377		0.919 6902	13219		0.398 9761	5737	
2.5	0.177 9864	83254	4878	0.918 3683	13869	795	0.398 4024	6019	346
3.0	0.186 3118	83124		0.916 9814	14517		0.397 8005	6300	
3.5	0.194 6242	82989	4863	0.915 5297	15165	869	0.397 1705	6581	378
4.0	0.202 9231	82846		0.914 0132	15813		0.396 5124	6862	
4.5	0.211 2077		4847	0.912 4319		943	0.395 8262		410
	—	82697		+	16459		+	7142	
5.0	0.219 4774	82541		0.910 7860	17105		0.395 1120	7422	
5.5	0.227 7315	82380	+4829	0.909 0755	17749	+1016	0.394 3698	7700	+442
6.0	0.235 9695	82212		0.907 3006	18392		0.393 5998	7979	
6.5	0.244 1907	82037	4810	0.905 4614	19032	1090	0.392 8019	8256	474
7.0	0.252 3944	81857		0.903 5582	19672		0.391 9763	8533	
7.5	0.260 5801	81670	4789	0.901 5910	20310	1163	0.391 1230	8810	506
8.0	0.268 7471	81477		0.899 5600	20946		0.390 2420	9085	
8.5	0.276 8948	81278	4767	0.897 4654	21579	1236	0.389 3335	9360	538
9.0	0.285 0226			0.895 3075			0.388 3975		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	*X*		Red. auf 1900.0	*Y*		Red. auf 1900.0	*Z*		Red. auf 1900.0
	—			+			+		
Juli 9.0	0.285 0226	81073		0.895 3075	22211		0.388 3975	9634	
9.5	0.293 1299	80863	+4743	0.893 0864	22840	+1309	0.387 4341	9906	+ 570
10.0	0.301 2162	80647		0.890 8024	23468		0.386 4435	10178	
10.5	0.309 2809	80425	4718	0.888 4556	24094	1381	0.385 4257	10450	601
11.0	0.317 3234	80198		0.886 0462	24718		0.384 3807	10720	
11.5	0.325 3432	79965	4693	0.883 5744	25339	1453	0.383 3087	10989	632
12.0	0.333 3397	79727		0.881 0405	25958		0.382 2098	11258	
12.5	0.341 3124	79482	4666	0.878 4447	26575	1525	0.381 0840	11525	663
13.0	0.349 2606	79233		0.875 7872	27190		0.379 9315	11792	
13.5	0.357 1839		4637	0.873 0682		1596	0.378 7523		694
	—	78978		+	27802		+	12058	
14.0	0.365 0817	78718		0.870 2880	28413		0.377 5465	12323	
14.5	0.372 9535	78454	+4607	0.867 4467	29021	+1666	0.376 3142	12587	+ 725
15.0	0.380 7989	78183		0.864 5446	29628		0.375 0555	12850	
15.5	0.388 6172	77907	4576	0.861 5818	30233	1736	0.373 7705	13113	755
16.0	0.396 4079	77627		0.858 5585	30835		0.372 4592	13374	
16.5	0.404 1706	77341	4544	0.855 4750	31435	1805	0.371 1218	13634	785
17.0	0.411 9047	77050		0.852 3315	32032		0.369 7584	13894	
17.5	0.419 6097	76754	4510	0.849 1283	32627	1874	0.368 3690	14152	815
18.0	0.427 2851	76453		0.845 8656	33220		0.366 9538	14409	
18.5	0.434 9304		4475	0.842 5436		1942	0.365 5129		845
	—	76146		+	33809		+	14666	
19.0	0.442 5450	75835		0.839 1627	34397		0.364 0463	14921	
19.5	0.450 1285	75519	+4439	0.835 7230	34983	+2010	0.362 5542	15176	+ 875
20.0	0.457 6804	75197		0.832 2247	35566		0.361 0366	15429	
20.5	0.465 2001	74871	4402	0.828 6681	36148	2077	0.359 4937	15682	904
21.0	0.472 6872	74540		0.825 0533	36727		0.357 9255	15933	
21.5	0.480 1412	74204	4363	0.821 3806	37303	2143	0.356 3322	16184	933
22.0	0.487 5616	73863		0.817 6503	37877		0.354 7138	16433	
22.5	0.494 9479	73518	4323	0.813 8626	38450	2210	0.353 0705	16682	962
23.0	0.502 2997	73167		0.810 0176	39020		0.351 4023	16929	
23.5	0.509 6164		4281	0.806 1156		2276	0.349 7094		991
	—	72810		+	39587		+	17176	
24.0	0.516 8974	72449		0.802 1569	40152		0.347 9918	17422	
24.5	0.524 1423	72083	+4239	0.798 1417	40716	+2341	0.346 2496	17667	+1019
25.0	0.531 3506	71712		0.794 0701	41277		0.344 4829	17910	
25.5	0.538 5218	71336	4195	0.789 9424	41834	2415	0.342 6919	18151	1047
26.0	0.545 6554	70955		0.785 7590	42390		0.340 8768	18392	
26.5	0.552 7509	70568	4150	0.781 5200	42943	2469	0.339 0376	18632	1075
27.0	0.559 8077	70177		0.777 2257	43494		0.337 1744	18872	
27.5	0.566 8254	69780	4105	0.772 8763	44042	2532	0.335 2872	19110	1102
28.0	0.573 8034			0.768 4721			0.333 3762		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902		X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
		—			+			+		
Juli	28.0	0.573 8034	69378		0.768 4721	44588		0.333 3762	19346	
	28.5	0.580 7412	68970	+4058	0.764 0133	45130	+2594	0.331 4416	19582	+1129
	29.0	0.587 6382	68558		0.759 5003	45671		0.329 4834	19816	
	29.5	0.594 4940	68139	4009	0.754 9332	46208	2656	0.327 5018	20049	1156
	30.0	0.601 3079	67716		0.750 3124	46743		0.325 4969	20281	
	30.5	0.608 0795	67287	3959	0.745 6381	47275	2716	0.323 4688	20510	1182
	31.0	0.614 8082	66853		0.740 9106	47802		0.321 4178	20739	
	31.5	0.621 4935	66414	3909	0.736 1304	48327	2776	0.319 3439	20967	1208
Aug.	1.0	0.628 1349	65969		0.731 2977	48849		0.317 2472	21192	
	1.5	0.634 7318	65519	3858	0.726 4128	49367	2835	0.315 1280	21417	1234
		—			+			+		
	2.0	0.641 2837	65064		0.721 4761	49882		0.312 9863	21640	
	2.5	0.647 7901	64603	+3805	0.716 4879	50392	+2893	0.310 8223	21861	+1259
	3.0	0.654 2504	64136		0.711 4487	50900		0.308 6362	22081	
	3.5	0.660 6640	63665	3751	0.706 3587	51404	2951	0.306 4281	22299	1284
	4.0	0.667 0305	63190		0.701 2183	51904		0.304 1982	22515	
	4.5	0.673 3495	62708	3696	0.696 0279	52400	3008	0.301 9467	22731	1309
	5.0	0.679 6203	62222		0.690 7879	52892		0.299 6736	22944	
	5.5	0.685 8425	61732	3640	0.685 4987	53380	3064	0.297 3792	23154	1333
	6.0	0.692 0157	61237		0.680 1607	53864		0.295 0638	23364	
	6.5	0.698 1394	60737	3583	0.674 7743	54342	3119	0.292 7274	23571	1357
		—			+			+		
	7.0	0.704 2131	60233		0.669 3401	54817		0.290 3703	23777	
	7.5	0.710 2364	59726	+3525	0.663 8584	55287	+3173	0.287 9926	23981	+1381
	8.0	0.716 2090	59214		0.658 3297	55753		0.285 5945	24183	
	8.5	0.722 1304	58697	3466	0.652 7544	56215	3226	0.283 1762	24384	1404
	9.0	0.728 0001	58177		0.647 1329	56673		0.280 7378	24583	
	9.5	0.733 8178	57652	3406	0.641 4656	57127	3278	0.278 2795	24779	1427
	10.0	0.739 5830	57124		0.635 7529	57576		0.275 8016	24975	
	10.5	0.745 2954	56592	3345	0.629 9953	58022	3330	0.273 3041	25168	1449
	11.0	0.750 9546	56056		0.624 1931	58463		0.270 7873	25359	
	11.5	0.756 5602	55515	3283	0.618 3468	58899	3380	0.268 2514	25549	1471
		—			+			+		
	12.0	0.762 1117	54972		0.612 4569	59332		0.265 6965	25737	
	12.5	0.767 6089	54424	+3220	0.606 5237	59760	+3429	0.263 1228	25922	+1492
	13.0	0.773 0513	53873		0.600 5477	60185		0.260 5306	26107	
	13.5	0.778 4386	53318	3156	0.594 5292	60604	3477	0.257 9199	26289	1513
	14.0	0.783 7704	52759		0.588 4688	61020		0.255 2910	26470	
	14.5	0.789 0463	52198	3092	0.582 3668	61431	3525	0.252 6440	26649	1534
	15.0	0.794 2661	51632		0.576 2237	61839		0.249 9791	26826	
	15.5	0.799 4293	51063	3026	0.570 0398	62242	3572	0.247 2965	27001	1554
	16.0	0.804 5356			0.563 8156			0.244 5964		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
	—			+			+		
Aug. 16.0	0.804 5356	50491		0.563 8156	62641		0.244 5964	27174	
16.5	0.809 5847	49916	+2960	0.557 5515	63034	+3618	0.241 8790	27346	+1574
17.0	0.814 5763	49337		0.551 2481	63424		0.239 1444	27515	
17.5	0.819 5100	48754	2893	0.544 9057	63810	3662	0.236 3929	27682	1593
18.0	0.824 3854	48169		0.538 5247	64191		0.233 6247	27848	
18.5	0.829 2023	47580	2826	0.532 1056	64569	3705	0.230 8399	28013	1612
19.0	0.833 9603	46988		0.525 6487	64942		0.228 0386	28175	
19.5	0.838 6591	46393	2757	0.519 1545	65311	3747	0.225 2211	28336	1630
20.0	0.843 2984	45794		0.512 6234	65677		0.222 3875	28494	
20.5	0.847 8778		2687	0.506 0557		3788	0.219 5381		1648
	—	45191		+	66037		+	28651	
21.0	0.852 3969	44586		0.499 4520	66394		0.216 6730	28806	
21.5	0.856 8555	43978	+2616	0.492 8126	66746	+3828	0.213 7924	28958	+1666
22.0	0.861 2533	43365		0.486 1380	67095		0.210 8966	29110	
22.5	0.865 5898	42750	2545	0.479 4285	67438	3868	0.207 9856	29259	1683
23.0	0.869 8648	42132		0.472 6847	67778		0.205 0597	29407	
23.5	0.874 0780	41509	2473	0.465 9069	68113	3906	0.202 1190	29553	1700
24.0	0.878 2289	40884		0.459 0956	68445		0.199 1637	29696	
24.5	0.882 3173	40255	2401	0.452 2511	68771	3943	0.196 1941	29838	1716
25.0	0.886 3428	39623		0.445 3740	69094		0.193 2103	29977	
25.5	0.890 3051		2328	0.438 4646		3979	0.190 2126		1731
	—	38987		+	69412		+	30115	
26.0	0.894 2038	38348		0.431 5234	69725		0.187 2011	30250	
26.5	0.898 0386	37706	+2254	0.424 5509	70033	+4014	0.184 1761	30384	+1746
27.0	0.901 8092	37059		0.417 5476	70336		0.181 1377	30515	
27.5	0.905 5151	36410	2179	0.410 5140	70636	4047	0.178 0862	30645	1760
28.0	0.909 1561	35757		0.403 4504	70930		0.175 0217	30772	
28.5	0.912 7318	35099	2104	0.396 3574	71219	4079	0.171 9445	30897	1774
29.0	0.916 2417	34439		0.389 2355	71503		0.168 8548	31020	
29.5	0.919 6856	33777	2028	0.382 0852	71782	4110	0.165 7528	31140	1788
30.0	0.923 0633	33110		0.374 9070	72055		0.162 6388	31258	
30.5	0.926 3743		1952	0.367 7015		4139	0.159 5130		1801
	—	32441		+	72322		+	31374	
31.0	0.929 6184	31769		0.360 4693	72584		0.156 3756	31487	
31.5	0.932 7953	31095	+1875	0.353 2109	72842	+4168	0.153 2269	31598	+1813
Sept. 1.0	0.935 9048	30418		0.345 9267	73093		0.150 0671	31707	
1.5	0.938 9466	29738	1798	0.338 6174	73339	4196	0.146 8964	31813	1825
2.0	0.941 9204	29056		0.331 2835	73579		0.143 7151	31917	
2.5	0.944 8260	28371	1720	0.323 9256	73813	4222	0.140 5234	32018	1837
3.0	0.947 6631	27683		0.316 5443	74042		0.137 3216	32118	
3.5	0.950 4314	26992	1642	0.309 1401	74266	4247	0.134 1098	32214	1848
4.0	0.953 1306			0.301 7135			0.130 8884		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
	−			+			+		
Sept. 4.0	0.953 1306	26299		0.301 7135	74483		0.130 8884	32308	
4.5	0.955 7605	25605	+1563	0.294 2652	74694	+4271	0.127 6576	32401	+1858
5.0	0.958 3210	24908		0.286 7958	74900		0.124 4175	32490	
5.5	0.960 8118	24211	1484	0.279 3058	75100	4294	0.121 1685	32576	1868
6.0	0.963 2329	23512		0.271 7958	75294		0.117 9109	32661	
6.5	0.965 5841	22811	1405	0.264 2664	75483	4315	0.114 6448	32742	1877
7.0	0.967 8652	22109		0.256 7181	75666		0.111 3706	32822	
7.5	0.970 0761	21405	1325	0.249 1515	75843	4335	0.108 0884	32899	1885
8.0	0.972 2166	20699		0.241 5672	76015		0.104 7985	32973	
8.5	0.974 2865		1244	0.233 9657		4354	0.101 5012		1893
	−	19993		+	76181		+	33046	
9.0	0.976 2858	19284		0.226 3476	76342		0.098 1966	33116	
9.5	0.978 2142	18573	+1163	0.218 7134	76497	+4371	0.094 8850	33184	+1901
10.0	0.980 0715	17862		0.211 0637	76647		0.091 5666	33249	
10.5	0.981 8577	17149	1082	0.203 3990	76791	4387	0.088 2417	33312	1908
11.0	0.983 5726	16436		0.195 7199	76929		0.084 9105	33372	
11.5	0.985 2162	15722	1000	0.188 0270	77062	4402	0.081 5733	33430	1914
12.0	0.986 7884	15006		0.180 3208	77189		0.078 2303	33486	
12.5	0.988 2890	14290	918	0.172 6019	77311	4416	0.074 8817	33539	1920
13.0	0.989 7180	13573		0.164 8708	77428		0.071 5278	33590	
13.5	0.991 0753		836	0.157 1280		4429	0.068 1688		1926
	−	12854		+	77539		+	33638	
14.0	0.992 3607	12135		0.149 3741	77645		0.064 8050	33685	
14.5	0.993 5742	11414	+ 753	0.141 6096	77746	+4441	0.061 4365	33729	+1931
15.0	0.994 7156	10693		0.133 8350	77842		0.058 0636	33771	
15.5	0.995 7849	9971	670	0.126 0508	77931	4451	0.054 6865	33809	1935
16.0	0.996 7820	9248		0.118 2577	78015		0.051 3056	33846	
16.5	0.997 7068	8525	587	0.110 4562	78094	4460	0.047 9210	33882	1939
17.0	0.998 5593	7801		0.102 6468	78168		0.044 5328	33914	
17.5	0.999 3394	7077	504	0.094 8300	78237	4467	0.041 1414	33944	1942
18.0	1.000 0471	6352		0.087 0063	78301		0.037 7470	33972	
18.5	1.000 6823		421	0.079 1762		4472	0.034 3498		1945
	−	5625		+	78359		+	33997	
19.0	1.001 2448	4898		0.071 3403	78413		0.030 9501	34021	
19.5	1.001 7346	4170	+ 338	0.063 4990	78461	+4477	0.027 5480	34041	+1947
20.0	1.002 1516	3441		0.055 6529	78503		0.024 1439	34060	
20.5	1.002 4957	2712	254	0.047 8026	78541	4480	0.020 7379	34075	1949
21.0	1.002 7669	1981		0.039 9485	78573		0.017 3304	34089	
21.5	1.002 9650	1249	170	0.032 0912	78600	4482	0.013 9215	34100	1950
22.0	1.003 0899	517		0.024 2312	78621		0.010 5115	34109	
22.5	1.003 1416	−215	86	0.016 3691	78637	4483	0.007 1006	34116	1950
23.0	1.003 1201			0.008 5054			0.003 6890		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
	−			+			+		
Sept. 23.0	1.003 1201	949		0.008 5054	78647		0.003 6890	34120	
23.5	1.003 0252	1684	+ 2	0.000 6407	78651	+4483	0.000 2770	34121	+1949
	—			—			—		
24.0	1.002 8568	2419		0.007 2244	78650		0.003 1351	34121	
24.5	1.002 6149	3156	− 82	0.015 0894	78643	4481	0.006 5472	34118	1948
25.0	1.002 2993	3892		0.022 9537	78630		0.009 9590	34113	
25.5	1.001 9101	4630	165	0.030 8167	78612	4477	0.013 3703	34104	1947
26.0	1.001 4471	5367		0.038 6779	78587		0.016 7807	34093	
26.5	1.000 9104	6105	249	0.046 5366	78557	4472	0.020 1900	34080	1945
27.0	1.000 2999	6843		0.054 3923	78521		0.023 5980	34063	
27.5	0.999 6156	7581	332	0.062 2444	78477	4467	0.027 0043	34044	1942
	—			—			—		
28.0	0.998 8575	8319		0.070 0921	78428		0.030 4087	34022	
28.5	0.998 0256	9057	− 415	0.077 9349	78373	+4460	0.033 8109	33997	+1939
29.0	0.997 1199	9795		0.085 7722	78311		0.037 2106	33970	
29.5	0.996 1404	10534	498	0.093 6033	78244	4451	0.040 6076	33940	1936
30.0	0.995 0870	11271		0.101 4277	78170		0.044 0016	33908	
30.5	0.993 9599	12009	581	0.109 2447	78089	4441	0.047 3924	33873	1932
Oct. 1.0	0.992 7590	12746		0.117 0536	78003		0.050 7797	33836	
1.5	0.991 4844	13481	664	0.124 8539	77910	4430	0.054 1633	33795	1927
2.0	0.990 1363	14216		0.132 6449	77811		0.057 5428	33752	
2.5	0.988 7147	14951	747	0.140 4260	77705	4418	0.060 9180	33707	1922
	—			—			—		
3.0	0.987 2196	15684		0.148 1965	77594		0.064 2887	33658	
3.5	0.985 6512	16416	− 829	0.155 9559	77476	+4404	0.067 6545	33607	+1916
4.0	0.984 0096	17147		0.163 7035	77353		0.071 0152	33553	
4.5	0.982 2949	17876	911	0.171 4388	77224	4389	0.074 3705	33497	1909
5.0	0.980 5073	18604		0.179 1612	77088		0.077 7202	33439	
5.5	0.978 6469	19331	993	0.186 8700	76947	4373	0.081 0641	33377	1902
6.0	0.976 7138	20056		0.194 5647	76799		0.084 4018	33313	
6.5	0.974 7082	20779	1075	0.202 2446	76646	4356	0.087 7331	33248	1894
7.0	0.972 6303	21501		0.209 9092	76487		0.091 0579	33179	
7.5	0.970 4802	22220	1156	0.217 5579	76321	4337	0.094 3758	33108	1886
	—			—			—		
8.0	0.968 2582	22938		0.225 1900	76151		0.097 6866	33035	
8.5	0.965 9644	23655	−1237	0.232 8051	75975	+4317	0.100 9901	32959	+1877
9.0	0.963 5989	24371		0.240 4026	75793		0.104 2860	32881	
9.5	0.961 1618	25084	1318	0.247 9819	75605	4295	0.107 5741	32800	1868
10.0	0.958 6534	25796		0.255 5424	75411		0.110 8541	32716	
10.5	0.956 0738	26505	1398	0.263 0835	75213	4272	0.114 1257	32629	1858
11.0	0.953 4233	27213		0.270 6048	75009		0.117 3886	32541	
11.5	0.950 7020	27919	1478	0.278 1057	74798	4248	0.120 6427	32450	1848
12.0	0.947 9101			0.285 5855			0.123 8877		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902		*X*		Red. auf 1900.0	*Y*		Red. auf 1900.0	*Z*		Red. auf 1900.0
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Oct.	12.0	0.947 9101	28622		0.285 5855	74583		0.123 8877	32357	
	12.5	0.945 0479	29322	−1558	0.293 0438	74363	+4223	0.127 1234	32262	+1837
	13.0	0.942 1157	30021		0.300 4801	74137		0.130 3496	32164	
	13.5	0.939 1136	30717	1637	0.307 8938	73905	4197	0.133 5660	32064	1825
	14.0	0.936 0419	31412		0.315 2843	73669		0.136 7724	31962	
	14.5	0.932 9007	32104	1715	0.322 6512	73427	4169	0.139 9686	31857	1813
	15.0	0.929 6903	32794		0.329 9939	73180		0.143 1543	31750	
	15.5	0.926 4109	33482	1793	0.337 3119	72929	4140	0.146 3293	31641	1801
	16.0	0.923 0627	34168		0.344 6048	72672		0.149 4934	31530	
	16.5	0.919 6459		1870	0.351 8720		4110	0.152 6464		1788
		—	34851		—	72410		—	31417	
	17.0	0.916 1608	35533		0.359 1130	72144		0.155 7881	31301	
	17.5	0.912 6075	36212	−1947	0.366 3274	71872	+4079	0.158 9182	31183	+1774
	18.0	0.908 9863	36889		0.373 5146	71595		0.162 0365	31063	
	18.5	0.905 2974	37564	2023	0.380 6741	71313	4046	0.165 1428	30940	1760
	19.0	0.901 5410	38237		0.387 8054	71026		0.168 2368	30815	
	19.5	0.897 7173	38908	2099	0.394 9080	70734	4012	0.171 3183	30688	1745
	20.0	0.893 8265	39576		0.401 9814	70436		0.174 3871	30558	
	20.5	0.889 8689	40243	2174	0.409 0250	70132	3977	0.177 4429	30427	1730
	21.0	0.885 8446	40907		0.416 0382	69824		0.180 4856	30293	
	21.5	0.881 7539		2248	0.423 0206		3940	0.183 5149		1714
		—	41570		—	69512		—	30157	
	22.0	0.877 5969	42230		0.429 9718	69193		0.186 5306	30019	
	22.5	0.873 3739	42888	−2322	0.436 8911	68869	+3902	0.189 5325	29877	+1698
	23.0	0.869 0851	43542		0.443 7780	68540		0.192 5202	29733	
	23.5	0.864 7309	44194	2395	0.450 6320	68204	3864	0.195 4935	29588	1681
	24.0	0.860 3115	44845		0.457 4524	67863		0.198 4523	29439	
	24.5	0.855 8270	45492	2467	0.464 2387	67517	3824	0.201 3962	29289	1664
	25.0	0.851 2778	46136		0.470 9904	67164		0.204 3251	29136	
	25.5	0.846 6642	46777	2538	0.477 7068	66807	3783	0.207 2387	28980	1646
	26.0	0.841 9865	47415		0.484 3875	66444		0.210 1367	28822	
	26.5	0.837 2450		2609	0.491 0319		3741	0.213 0189		1628
		—	48051		—	66075		—	28662	
	27.0	0.832 4399	48683		0.497 6394	65701		0.215 8851	28499	
	27.5	0.827 5716	49311	−2679	0.504 2095	65322	+3698	0.218 7350	28335	+1609
	28.0	0.822 6405	49937		0.510 7417	64936		0.221 5685	28167	
	28.5	0.817 6468	50558	2748	0.517 2353	64546	3654	0.224 3852	27997	1590
	29.0	0.812 5910	51176		0.523 6899	64149		0.227 1849	27825	
	29.5	0.807 4734	51789	2816	0.530 1048	63746	3608	0.229 9674	27651	1570
	30.0	0.802 2945	52399		0.536 4794	63339		0.232 7325	27474	
	30.5	0.797 0546	53006	2884	0.542 8133	62926	3562	0.235 4799	27295	1550
	31.0	0.791 7540			0.549 1059			0.238 2094		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902		*X*		Red. auf 1900.0	*Y*		Red. auf 1900.0	*Z*		Red. auf 1900.0
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Oct.	31.0	0.791 7540	53608		0.549 1059	62508		0.238 2094	27114	
	31.5	0.786 3932	54206	−2951	0.555 3567	62086	+3515	0.240 9208	26931	+1529
Nov.	1.0	0.780 9726	54800		0.561 5653	61658		0.243 6139	26745	
	1.5	0.775 4926	55389	3016	0.567 7311	61225	3467	0.246 2884	26557	1508
	2.0	0.769 9537	55974		0.573 8536	60787		0.248 9441	26367	
	2.5	0.764 3563	56554	3081	0.579 9323	60344	3417	0.251 5808	26176	1486
	3.0	0.758 7009	57131		0.585 9667	59896		0.254 1984	25982	
	3.5	0.752 9878	57703	3145	0.591 9563	59444	3366	0.256 7966	25787	1464
	4.0	0.747 2175	58270		0.597 9007	58986		0.259 3753	25588	
	4.5	0.741 3905		3208	0.603 7993		3314	0.261 9341		1441
		—	58833		—	58525		—	25388	
	5.0	0.735 5072	59391		0.609 6518	58059		0.264 4729	25186	
	5.5	0.729 5681	59944	−3269	0.615 4577	57587	+3262	0.266 9915	24981	+1418
	6.0	0.723 5737	60493		0.621 2164	57111		0.269 4896	24775	
	6.5	0.717 5244	61037	3330	0.626 9275	56632	3208	0.271 9671	24568	1395
	7.0	0.711 4207	61576		0.632 5907	56147		0.274 4239	24358	
	7.5	0.705 2631	62110	3390	0.638 2054	55658	3153	0.276 8597	24147	1371
	8.0	0.699 0521	62640		0.643 7712	55165		0.279 2744	23934	
	8.5	0.692 7881	63164	3449	0.649 2877	54668	3097	0.281 6678	23718	1347
	9.0	0.686 4717	63684		0.654 7545	54168		0.284 0396	23501	
	9.5	0.680 1033		3506	0.660 1713		3041	0.286 3897		1323
		—	64199		—	53663		—	23283	
	10.0	0.673 6834	64709		0.665 5376	53155		0.288 7180	23062	
	10.5	0.667 2125	65213	−3563	0.670 8531	52642	+2983	0.291 0242	22840	+1298
	11.0	0.660 6912	65713		0.676 1173	52126		0.293 3082	22616	
	11.5	0.654 1199	66209	3619	0.681 3299	51605	2924	0.295 5698	22391	1272
	12.0	0.647 4990	66699		0.686 4904	51081		0.297 8089	22164	
	12.5	0.640 8291	67184	3674	0.691 5985	50554	2865	0.300 0253	21934	1246
	13.0	0.634 1107	67665		0.696 6539	50023		0.302 2187	21704	
	13.5	0.627 3442	68140	3728	0.701 6562	49489	2805	0.304 3891	21473	1220
	14.0	0.620 5302	68610		0.706 6051	48951		0.306 5364	21239	
	14.5	0.613 6692		3780	0.711 5002		2743	0.308 6603		1193
		—	69076		—	48409		—	21005	
	15.0	0.606 7616	69537		0.716 3411	47865		0.310 7608	20769	
	15.5	0.599 8079	69993	−3831	0.721 1276	47317	+2681	0.312 8377	20530	+1166
	16.0	0.592 8086	70445		0.725 8593	46765		0.314 8907	20291	
	16.5	0.585 7641	70892	3881	0.730 5358	46210	2618	0.316 9198	20049	1139
	17.0	0.578 6749	71335		0.735 1568	45652		0.318 9247	19806	
	17.5	0.571 5414	71772	3930	0.739 7220	45089	2554	0.320 9053	19562	1111
	18.0	0.564 3642	72205		0.744 2309	44523		0.322 8615	19316	
	18.5	0.557 1437	72634	3978	0.748 6832	43953	2490	0.324 7931	19068	1083
	19.0	0.549 8803			0.753 0785			0.326 6999		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	*X*		Red. auf 1900.0	*Y*		Red. auf 1900.0	*Z*		Red. auf 1900.0
	—			—			—		
Nov. 19.0	0.549 8803	73057		0.753 0785	43379		0.326 6999	18819	
19.5	0.542 5746	73474	−4025	0.757 4164	42802	+2425	0.328 5818	18568	+1055
20.0	0.535 2272	73887		0.761 6966	42221		0.330 4386	18315	
20.5	0.527 8385	74296	4070	0.765 9187	41637	2360	0.332 2701	18062	1026
21.0	0.520 4089	74698		0.770 0824	41048		0.334 0763	17806	
21.5	0.512 9391	75096	4114	0.774 1872	40456	2293	0.335 8569	17549	997
22.0	0.505 4295	75488		0.778 2328	39860		0.337 6118	17290	
22.5	0.497 8807	75875	4156	0.782 2188	39261	2225	0.339 3408	17030	967
23.0	0.490 2932	76256		0.786 1449	38657		0.341 0438	16768	
23.5	0.482 6676		4197	0.790 0106		2157	0.342 7206		938
	—	76631		—	38051		—	16504	
24.0	0.475 0045	77000		0.793 8157	37441		0.344 3710	16240	
24.5	0.467 3045	77364	−4237	0.797 5598	36827	+2089	0.345 9950	15973	+ 908
25.0	0.459 5681	77722		0.801 2425	36210		0.347 5923	15705	
25.5	0.451 7959	78073	4276	0.804 8635	35589	2020	0.349 1628	15436	878
26.0	0.443 9886	78419		0.808 4224	34965		0.350 7064	15165	
26.5	0.436 1467	78758	4314	0.811 9189	34337	1950	0.352 2229	14893	847
27.0	0.428 2709	79091		0.815 3526	33706		0.353 7122	14620	
27.5	0.420 3618	79417	4350	0.818 7232	33074	1879	0.355 1742	14345	817
28.0	0.412 4201	79738		0.822 0306	32438		0.356 6087	14070	
28.5	0.404 4463		4384	0.825 2744		1808	0.358 0157		786
	—	80052		—	31800		—	13792	
29.0	0.396 4411	80360		0.828 4544	31158		0.359 3949	13514	
29.5	0.388 4051	80662	−4417	0.831 5702	30513	+1736	0.360 7463	13234	+ 755
30.0	0.380 3389	80956		0.834 6215	29866		0.362 0697	12954	
30.5	0.372 2433	81244	4449	0.837 6081	29215	1664	0.363 3651	12672	724
Dec. 1.0	0.364 1189	81526		0.840 5296	28563		0.364 6323	12389	
1.5	0.355 9663	81801	4479	0.843 3859	27908	1591	0.365 8712	12106	692
2.0	0.347 7862	82069		0.846 1767	27252		0.367 0818	11821	
2.5	0.339 5793	82330	4509	0.848 9019	26592	1518	0.368 2639	11535	660
3.0	0.331 3463	82585		0.851 5611	25931		0.369 4174	11249	
3.5	0.323 0878		4537	0.854 1542		1445	0.370 5423		628
	—	82833		—	25267		—	10961	
4.0	0.314 8045	83075		0.856 6809	24602		0.371 6384	10673	
4.5	0.306 4970	83309	−4564	0.859 1411	23936	+1371	0.372 7057	10384	+ 596
5.0	0.298 1661	83538		0.861 5347	23267		0.373 7441	10094	
5.5	0.289 8123	83760	4589	0.863 8614	22595	1296	0.374 7535	9804	564
6.0	0.281 4363	83975		0.866 1209	21923		0.375 7339	9513	
6.5	0.273 0388	84182	4612	0.868 3132	21249	1221	0.376 6852	9221	531
7.0	0.264 6206	84384		0.870 4381	20574		0.377 6073	8928	
7.5	0.256 1822	84578	4634	0.872 4955	19896	1145	0.378 5001	8635	498
8.0	0.247 7244			0.874 4851			0.379 3636		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	X		Red. auf 1900.0	Y		Red. auf 1900.0	Z		Red. auf 1900.0
	—			—			—		
Dec. 8.0	0.247 7244	84766		0.874 4851	19218		0.379 3636	8340	
8.5	0.239 2478	84947	−4655	0.876 4069	18539	+1070	0.380 1976	8046	+465
9.0	0.230 7531	85121		0.878 2608	17858		0.381 0022	7751	
9.5	0.222 2410	85290	4675	0.880 0466	17177	994	0.381 7773	7455	432
10.0	0.213 7120	85452		0.881 7643	16495		0.382 5228	7160	
10.5	0.205 1668	85606	4693	0.883 4138	15811	918	0.383 2388	6863	399
11.0	0.196 6062	85755		0.884 9949	15128		0.383 9251	6567	
11.5	0.188 0307	85897	4709	0.886 5077	14443	841	0.384 5818	6269	366
12.0	0.179 4410	86033		0.887 9520	13758		0.385 2087	5972	
12.5	0.170 8377	86163	4724	0.889 3278	13071	764	0.385 8059	5673	333
	—			—			—		
13.0	0.162 2214	86286		0.890 6349	12384		0.386 3732	5375	
13.5	0.153 5928	86403	−4738	0.891 8733	11696	+ 687	0.386 9107	5076	+299
14.0	0.144 9525	86514		0.893 0429	11007		0.387 4183	4777	
14.5	0.136 3011	86618	4750	0.894 1436	10317	610	0.387 8960	4477	265
15.0	0.127 6393	86717		0.895 1753	9626		0.388 3437	4178	
15.5	0.118 9676	86810	4760	0.896 1379	8935	532	0.388 7615	3877	232
16.0	0.110 2866	86897		0.897 0314	8243		0.389 1492	3576	
16.5	0.101 5969	86977	4769	0.897 8557	7550	454	0.389 5068	3276	198
17.0	0.092 8992	87052		0.898 6107	6856		0.389 8344	2974	
17.5	0.084 1940	87120	4777	0.899 2963	6162	376	0.390 1318	2673	164
	—			—			—		
18.0	0.075 4820	87182		0.899 9125	5466		0.390 3991	2370	
18.5	0.066 7638	87237	−4783	0.900 4591	4769	+ 299	0.390 6361	2068	+130
19.0	0.058 0401	87286		0.900 9360	4071		0.390 8429	1765	
19.5	0.049 3115	87327	4788	0.901 3431	3373	221	0.391 0194	1461	96
20.0	0.040 5788	87363		0.901 6804	2673		0.391 1655	1157	
20.5	0.031 8425	87392	4791	0.901 9477	1973	143	0.391 2812	854	62
21.0	0.023 1033	87414		0.902 1450	1272		0.391 3666	550	
21.5	0.014 3619	87430	4793	0.902 2722	572	+ 65	0.391 4216	245	+ 28
22.0	0.005 6189	87438		0.902 3294	130		0.391 4461	60	
	+			—			—		
22.5	0.003 1249	87439	4793	0.902 3164	833	— 13	0.391 4401	365	— 6
	+			—			—		
23.0	0.011 8688	87434		0.902 2331	1535		0.391 4036	669	
23.5	0.020 6122	87421	−4792	0.902 0796	2238	— 91	0.391 3367	974	— 40
24.0	0.029 3543	87402		0.901 8558	2941		0.391 2393	1279	
24.5	0.038 0945	87375	4789	0.901 5617	3644	169	0.391 1114	1585	74
25.0	0.046 8320	87341		0.901 1973	4348		0.390 9529	1890	
25.5	0.055 5661	87301	4785	0.900 7625	5052	247	0.390 7639	2195	108
26.0	0.064 2962	87253		0.900 2573	5755		0.390 5444	2499	
26.5	0.073 0215	87198	4779	0.899 6818	6458	325	0.390 2945	2804	142
27.0	0.081 7413			0.899 0360			0.390 0141		

Mittl. Aequator und Mittl. Aequinoctium 1902.0.

1902	*X*		Red. auf 1900.0	*Y*		Red. auf 1900.0	*Z*		Red. auf 1900.0
	+			—			—		
Dec. 27.0	0.081 7413	87136		0.899 0360	7161		0.390 0141	3109	
27.5	0.090 4549	87066	—4772	0.898 3199	7863	— 403	0.389 7032	3413	—176
28.0	0.099 1615	86990		0.897 5336	8565		0.389 3619	3717	
28.5	0.107 8605	86906	4763	0.896 6771	9265	481	0.388 9902	4021	210
29.0	0.116 5511	86815		0.895 7506	9965		0.388 5881	4325	
29.5	0.125 2326	86717	4753	0.894 7541	10665	559	0.388 1556	4627	244
30.0	0.133 9043	86612		0.893 6876	11365		0.387 6929	4930	
30.5	0.142 5655	86500	4741	0.892 5511	12063	636	0.387 1999	5232	277
31.0	0.151 2155	86381		0.891 3448	12759		0.386 6767	5534	
31.5	0.159 8536	86254	4728	0.890 0689	13455	713	0.386 1233	5836	310
	+			—			—		
32.0	0.168 4790	86121		0.888 7234	14149		0.385 5397	6137	
32.5	0.177 0911	85981	—4714	0.887 3085	14842	— 790	0.384 9260	6437	—343
33.0	0.185 6892	85834		0.885 8243	15533		0.384 2823	6737	
33.5	0.194 2726	85679	4698	0.884 2710	16223	867	0.383 6086	7036	377
34.0	0.202 8405	85518		0.882 6487	16912		0.382 9050	7335	
34.5	0.211 3923	85350	4680	0.880 9575	17599	944	0.382 1715	7632	411
35.0	0.219 9273	85175		0.879 1976	18284		0.381 4083	7929	
35.5	0.228 4448	84994	4661	0.877 3692	18967	1020	0.380 6154	8225	444
36.0	0.236 9442	84805		0.875 4725	19648		0.379 7929	8521	
36.5	0.245 4247	84610	4640	0.873 5077	20329	1096	0.378 9408	8815	477
	+			—			—		
37.0	0.253 8857			0.871 4748			0.378 0593		

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
Jan. 1.0	12 24 3.28	23 13.06	− 5 43 23.3	−1 57 34.9	8.20545	−222	15 2.1
1.5	12 47 16.34	23 12.53	7 40 58.2	1 51 50.8	8.20323	190	14 57.5
2.0	13 10 28.87	23 16.61	9 32 49.0	1 45 14.8	8.20133	157	14 53.6
2.5	13 33 45.48	23 24.76	11 18 3.8	1 37 48.5	8.19976	123	14 50.4
3.0	13 57 10.24	23 36.41	12 55 52.3	1 29 33.1	8.19853	90	14 47.9
3.5	14 20 46.65	23 50.87	14 25 25.4	1 20 28.7	8.19763	58	14 46.0
4.0	14 44 37.52	24 7.29	15 45 54.1	1 10 35.9	8.19705	− 27	14 44.8
4.5	15 8 44.81	24 24.84	16 56 30.0	0 59 55.8	8.19678	+ 3	14 44.3
5.0	15 33 9.65	24 42.62	17 56 25.8	0 48 30.4	8.19681	30	14 44.4
5.5	15 57 52.27	24 59.77	18 44 56.2	−0 36 23.2	8.19711	+ 56	14 45.0
6.0	16 22 52.04	25 15.30	−19 21 19.4	0 23 38.9	8.19767	79	14 46.1
6.5	16 48 7.34	25 28.47	19 44 58.3	−0 10 24.1	8.19846	100	14 47.7
7.0	17 13 35.81	25 38.70	19 55 22.4	+0 3 12.9	8.19946	117	14 49.8
7.5	17 39 14.51	25 45.48	19 52 9.5	0 17 2.1	8.20063	133	14 52.2
8.0	18 4 59.99	25 48.65	19 35 7.4	0 30 52.7	8.20196	146	14 54.9
8.5	18 30 48.64	25 48.34	19 4 14.7	0 44 32.9	8.20342	156	14 57.9
9.0	18 56 36.98	25 44.83	18 19 41.8	0 57 50.4	8.20498	164	15 1.2
9.5	19 22 21.81	25 38.79	17 21 51.4	1 10 34.6	8.20662	171	15 4.6
10.0	19 48 0.60	25 30.96	16 11 16.8	1 22 33.9	8.20833	177	15 8.1
10.5	20 13 31.56	25 22.22	14 48 42.9	+1 33 38.8	8.21010	+180	15 11.8
11.0	20 38 53.78	25 13.56	−13 15 4.1	1 43 41.2	8.21190	182	15 15.6
11.5	21 4 7.34	25 5.90	11 31 22.9	1 52 33.6	8.21372	185	15 19.5
12.0	21 29 13.24	25 0.22	9 38 49.3	2 0 10.5	8.21557	187	15 23.4
12.5	21 54 13.46	24 57.36	7 38 38.8	2 6 26.4	8.21744	188	15 27.4
13.0	22 19 10.82	24 58.06	5 32 12.4	2 11 17.7	8.21932	189	15 31.4
13.5	22 44 8.88	25 2.92	3 20 54.7	2 14 39.5	8.22121	190	15 35.5
14.0	23 9 11.80	25 12.48	− 1 6 15.2	2 16 28.2	8.22311	190	15 39.6
14.5	23 34 24.28	25 27.03	+ 1 10 13.0	2 16 39.5	8.22501	189	15 43.7
15.0	23 59 51.31	25 46.72	3 26 52.5	2 15 8.8	8.22690	189	15 47.8
15.5	0 25 38.03	26 11.51	5 42 1.3	+2 11 50.6	8.22879	+187	15 51.9
16.0	0 51 49.54	26 41.02	+ 7 53 51.9	2 6 39.9	8.23066	183	15 56.0
16.5	1 18 30.56	27 14.63	10 0 31.8	1 59 31.4	8.23249	176	16 0.1
17.0	1 45 45.19	27 51.31	12 0 3.2	1 50 21.0	8.23425	167	16 4.0
17.5	2 13 36.50	28 29.71	13 50 24.2	1 39 6.5	8.23592	156	16 7.7
18.0	2 42 6.21	29 8.00	15 29 30.7	1 25 49.2	8.23748	139	16 11.2
18.5	3 11 14.21	29 44.02	16 55 19.9	1 10 35.1	8.23887	119	16 14.3
19.0	3 40 58.23	30 15.52	18 5 55.0	0 53 35.6	8.24006	96	16 17.0
19.5	4 11 13.75	30 40.22	18 59 30.6	0 35 9.2	8.24102	68	16 19.1
20.0	4 41 53.97	30 55.99	19 34 39.8	+0 15 41.5	8.24170	36	16 20.7
20.5	5 12 49.96		19 50 21.3		8.24206		16 21.5

Jan. 1 5h 1.4m Letztes Viertel. Jan. 9 10h 8.2m Neumond. Jan. 16 19h 32.0m Erstes Viertel.

Im Meridian von Berlin.

Datum und Culmination	Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1^h Länge	Decl.	Bew. in 1^h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Gr.
	h m	h m s	s	s	° ′	′	h m	° ′	
Jan. 1 *U*	5 53.8	12 35 28	+62.50	119.60	− 6 41.8	−10.1	12 34.2	− 7 27	4.7
O	18 15.7	12 59 23	+62.50	119.56	− 8 40.1	− 9.6	12 46.3	− 9 48	6.5
2 *U*	6 37.6	13 23 19	+62.59	119.95	−10 31.8	− 9.0	13 20.0	−10 39	1.2
O	18 59.7	13 47 23	+62.78	120.74	−12 16.0	− 8.3	13 27.8	− 9 40	5.5
3 *U*	7 21.9	14 11 38	+63.05	121.85	−13 51.9	− 7.6	14 3.2	−11 22	6.5
O	19 44.3	14 36 8	+63.38	123.20	−15 18.4	− 6.8	14 13.8	−12 55	4.6
4 *U*	8 7.1	15 0 55	+63.75	124.73	−16 34.8	− 5.9	15 1.2	−15 53	5.4
O	20 30.2	15 26 1	+64.15	126.36	−17 40.1	− 5.0	15 6.4	−15 47	6.5
5 *U*	8 53.6	15 51 27	+64.54	127.99	−18 33.5	− 3.9			
O	21 17.3	16 17 12	+64.91	129.54	−19 14.2	− 2.8			
6 *U*	9 41.3	16 43 14	+65.23	130.92	−19 41.4	− 1.7			
O	22 5.5	17 9 32	+65.48	132.05	−19 54.6	− 0.5			
7 *U*	10 30.0	17 36 2	+65.67	132.87	−19 53.3	+ 0.7			
O	22 54.6	18 2 39	+65.78	133.37	−19 37.3	+ 2.0			
8 *U*	11 19.2	18 29 21	+65.80	133.51	−19 6.4	+ 3.2			
O	23 43.9	18 56 2	+65.75	133.33	−18 20.8	+ 4.4			
9 *U*	12 8.5	19 22 40	−65.62	132.90	−17 21.1	+ 5.6			
—	—	—	—	—	—	—			
10 *O*	0 33.0	19 49 11	−65.45	132.24	−16 7.8	+ 6.7			
U	12 57.3	20 15 33	−65.26	131.46	−14 41.7	+ 7.7			
11 *O*	1 21.5	20 41 45	−65.07	130.65	−13 3.8	+ 8.6			
U	13 45.5	21 7 48	−64.90	129.89	−11 15.4	+ 9.5			
12 *O*	2 9.3	21 33 43	−64.78	129.28	− 9 17.8	+10.2			
U	14 33.1	21 59 32	−64.71	128.92	− 7 12.3	+10.8			
13 *O*	2 56.8	22 25 18	−64.73	128.89	− 5 0.4	+11.2			
U	15 20.6	22 51 7	−64.87	129.23	− 2 43.7	+11.5			
14 *O*	3 44.5	23 17 2	−65.10	130.00	− 0 23.8	+11.7			
U	16 8.6	23 43 10	−65.45	131.26	+ 1 57.5	+11.8			
15 *O*	4 33.0	0 9 36	−65.93	133.00	+ 4 18.4	+11.7	23 41.4	+ 2 57	5.2
U	16 57.8	0 36 25	−66.51	135.23	+ 6 37.0	+11.4	23 47.0	+ 2 23	5.9
16 *O*	5 23.1	1 3 44	−67.21	137.94	+ 8 51.5	+11.0	0 27.3	+ 6 25	5.7
U	17 48.9	1 31 38	−68.00	141.05	+10 59.5	+10.3	0 43.2	+ 6 46	6.0
17 *O*	6 15.4	2 0 12	−68.86	144.47	+12 58.9	+ 9.5	1 31.9	+11 38	5.6
U	18 42.6	2 29 28	−69.73	148.07	+14 47.4	+ 8.5	1 45.7	+10 33	5.8
18 *O*	7 10.6	2 59 27	−70.59	151.65	+16 22.6	+ 7.3	2 27.6	+14 36	6.5
U	19 39.2	3 30 8	−71.37	155.01	+17 42.2	+ 5.9	2 39.2	+14 54	5.8
19 *O*	8 8.5	4 1 27	−72.03	157.91	+18 44.2	+ 4.4	3 25.8	+17 36	6.5
U	20 38.3	4 33 16	−72.51	160.12	+19 26.7	+ 2.7	3 33.9	+16 13	6.4
20 *O*	9 8.4	5 5 27	−72.78	161.40	+19 48.4	+ 0.9	4 32.5	+20 29	5.8
U	21 38.7	5 37 46	−72.80	161.66	+19 48.5	− 0.9	4 40.6	+18 33	6.5

Jan. 4 17^h Apogaeum. Jan. 20 19^h Perigaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
Jan. 20.0	4 41 53.97	30 55.99	+19 34 39.8	+0 15 41.5	8.24170	+ 36	16 20.7
20.5	5 12 49.96	31 1.48	19 50 21.3	−0 4 17.5	8.24206	+ 1	16 21.5
21.0	5 43 51.44	30 56.08	19 46 3.8	0 24 13.1	8.24207	− 35	16 21.5
21.5	6 14 47.52	30 40.03	19 21 50.7	0 43 30.7	8.24172	75	16 20.7
22.0	6 45 27.55	30 14.46	18 38 20.0	1 1 37.5	8.24097	113	16 19.0
22.5	7 15 42.01	29 41.18	17 36 42.5	1 18 5.9	8.23984	151	16 16.5
23.0	7 45 23.19	29 2.38	16 18 36.6	1 32 35.3	8.23833	186	16 13.1
23.5	8 14 25.57	28 20.35	14 46 1.3	1 44 52.2	8.23647	220	16 8.9
24.0	8 42 45.92	27 37.24	13 1 9.1	1 54 50.4	8.23427	247	16 4.0
24.5	9 10 23.16	26 54.95	11 6 18.7	−2 2 30.3	8.23180	−271	15 58.5
25.0	9 37 18.11	26 15.01	+ 9 3 48.4	2 7 56.9	8.22909	289	15 52.6
25.5	10 3 33.12	25 38.56	6 55 51.5	2 11 18.7	8.22620	299	15 46.3
26.0	10 29 11.68	25 6.38	4 44 32.8	2 12 46.8	8.22321	305	15 39.8
26.5	10 54 18.06	24 38.94	2 31 46.0	2 12 31.8	8.22016	304	15 33.2
27.0	11 18 57.00	24 16.57	+ 0 19 14.2	2 10 45.4	8.21712	296	15 26.7
27.5	11 43 13.57	23 59.29	− 1 51 31.2	2 7 37.4	8.21416	284	15 20.4
28.0	12 7 12.86	23 47.03	3 59 8.6	2 3 17.6	8.21132	267	15 14.4
28.5	12 30 59.89	23 39.58	6 2 26.2	1 57 53.4	8.20865	244	15 8.8
29.0	12 54 39.47	23 36.70	8 0 19.6	1 51 31.0	8.20621	218	15 3.7
29.5	13 18 16.17	23 37.97	9 51 50.6	−1 44 15.9	8.20403	−189	14 59.2
30.0	13 41 54.14	23 43.00	−11 36 6.5	1 36 11.3	8.20214	157	14 55.3
30.5	14 5 37.14	23 51.25	13 12 17.8	1 27 20.1	8.20057	123	14 52.1
31.0	14 29 28.39	24 2.18	14 39 37.9	1 17 44.6	8.19934	89	14 49.5
31.5	14 53 30.57	24 15.11	15 57 22.5	1 7 26.7	8.19845	55	14 47.7
Febr. 1.0	15 17 45.68	24 29.34	17 4 49.2	0 56 28.2	8.19790	− 19	14 46.6
1.5	15 42 15.02	24 44.19	18 1 17.4	0 44 51.0	8.19771	+ 16	14 46.2
2.0	16 6 59.21	24 58.86	18 46 8.4	0 32 38.7	8.19787	49	14 46.5
2.5	16 31 58.07	25 12.70	19 18 47.1	0 19 54.9	8.19836	79	14 47.5
3.0	16 57 10.77	25 24.99	19 38 42.0	−0 6 44.8	8.19915	108	14 49.1
3.5	17 22 35.76	25 35.23	19 45 26.8	+0 6 44.8	8.20023	+135	14 51.4
4.0	17 48 10.99	25 42.98	−19 38 42.0	0 20 26.3	8.20158	159	14 54.1
4.5	18 13 53.97	25 48.07	19 18 15.7	0 34 10.3	8.20317	179	14 57.4
5.0	18 39 42.04	25 50.51	18 44 5.4	0 47 46.6	8.20496	194	15 1.1
5.5	19 5 32.55	25 50.46	17 56 18.8	1 1 4.0	8.20690	207	15 5.1
6.0	19 31 23.01	25 48.38	16 55 14.8	1 13 51.9	8.20897	216	15 9.5
6.5	19 57 11.39	25 44.82	15 41 22.9	1 25 57.8	8.21113	219	15 14.0
7.0	20 22 56.21	25 40.42	14 15 25.1	1 37 11.4	8.21332	221	15 18.6
7.5	20 48 36.63	25 35.98	12 38 13.7	1 47 21.4	8.21553	218	15 23.3
8.0	21 14 12.61	25 32.31	10 50 52.3	1 56 18.4	8.21771	214	15 28.0
8.5	21 39 44.92		8 54 33.9		8.21985		15 32.5

Jan. 23 12h 59.8m Vollmond. Jan. 31 2h 2.2m Letztes Viertel.

+6.4 +6.4

Im Meridian von Berlin.

Datum und Culmination	Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Vergl.-Sterne Gr.
	h m	h m s	s	s	° '	'	h m	° '	
Jan. 20 *O*	9 8.4	5 5 27	−72.78	161.40	+19 48.4	+ 0.9	4 32.5	+20 29	5.8
U	21 38.7	5 37 46	−72.80	161.66	+19 48.5	− 0.9	4 40.6	+18 33	6.5
21 *O*	10 8.9	6 10 2	−72.57	160.82	+19 26.9	− 2.7	5 31.8	+21 5	3.0
U	22 38.8	6 42 1	−72.10	158.97	+18 44.2	− 4.4	5 41.8	+17 42	5.5
22 *O*	11 8.3	7 13 33	−71.43	156.26	+17 41.7	− 6.0	6 41.7	+18 18	6.5
U	23 37.2	7 44 27	−70.61	152.87	+16 21.3	− 7.4	6 56.8	+17 54	6.2
23 *O*	12 5.3	8 14 38	−69.67	149.07	+14 45.3	− 8.6	7 33.9	+17 54	5.2
—	—	—	—	—	—	—	7 51.5	+16 3	5.9
24 *U*	0 32.6	8 44 2	+68.69	144.89	+12 56.1	− 9.6	8 41.6	+12 28	5.8
O	12 59.1	9 12 37	+67.71	140.89	+10 56.5	−10.3	8 50.6	+12 0	5.7
25 *U*	1 24.9	9 40 26	+66.78	137.08	+ 8 49.0	−10.9	9 36.0	+10 20	3.8
O	13 49.9	10 7 30	+65.91	133.57	+ 6 36.0	−11.3	9 51.3	+ 9 24	6.0
26 *U*	2 14.3	10 33 55	+65.13	130.47	+ 4 19.8	−11.4	10 17.9	+ 7 2	6.5
O	14 38.1	10 59 45	+64.47	127.83	+ 2 2.6	−11.4	10 38.3	+ 5 16	6.1
27 *U*	3 1.4	11 25 6	+63.93	125.65	− 0 13.9	−11.3	11 19.0	+ 1 57	5.5
O	15 24.4	11 50 4	+63.52	123.95	− 2 28.1	−11.0	11 32.0	− 0 17	4.5
28 *U*	3 47.0	12 14 44	+63.23	122.76	− 4 38.5	−10.6	12 13.2	− 3 24	6.8
O	16 9.4	12 39 12	+63.06	122.02	− 6 43.9	−10.2	12 18.2	− 4 26	6.5
29 *U*	4 31.8	13 3 34	+62.99	121.71	− 8 43.2	− 9.7	13 4.6	− 9 48	6.5
O	16 54.1	13 27 55	+63.03	121.80	−10 35.4	− 9.0	13 20.1	−10 39	1.2
30 *U*	5 16.4	13 52 19	+63.17	122.24	−12 19.4	− 8.3	13 42.1	− 9 13	6.3
O	17 38.9	14 16 49	+63.37	122.99	−13 54.6	− 7.5	14 3.3	−11 22	6.5
31 *U*	6 1.6	14 41 31	+63.64	124.00	−15 19.9	− 6.7	14 40.6	−15 3	6.2
O	18 24.5	15 6 26	+63.95	125.20	−16 34.7	− 5.8	14 45.5	−15 38	3.0
Febr. 1 *U*	6 47.6	15 31 36	+64.29	126.51	−17 38.2	− 4.8	15 33.3	−18 59	5.7
O	19 11.0	15 57 2	+64.63	127.88	−18 29.5	− 3.8	15 44.3	−17 36	6.5
2 *U*	7 34.7	16 22 44	+64.96	129.22	−19 8.2	− 2.7	16 21.4	−18 14	5.0
O	19 58.6	16 48 42	+65.25	130.48	−19 33.5	− 1.5	16 34.8	−20 13	6.5
3 *U*	8 22.8	17 14 55	+65.50	131.59	−19 44.8	− 0.3	17 14.2	−17 39	6.0
O	20 47.2	17 41 19	+65.69	132.47	−19 41.9	+ 0.9	17 18.9	−18 21	6.3
4 *U*	9 11.7	18 7 53	+65.82	133.13	−19 24.3	+ 2.1			
O	21 36.3	18 34 33	+65.89	133.52	−18 52.0	+ 3.3			
5 *U*	10 1.0	19 1 16	+65.89	133.67	−18 5.1	+ 4.5			
O	22 25.7	19 28 0	+65.85	133.58	−17 4.0	+ 5.7			
6 *U*	10 50.3	19 54 42	+65.76	133.32	−15 49.1	+ 6.8			
O	23 14.9	20 21 20	+65.64	132.96	−14 21.2	+ 7.8			
7 *U*	11 39.4	20 47 53	+65.52	132.54	−12 41.2	+ 8.8			
—	—	—	—	—	—	—			
8 *O*	0 3.9	21 14 21	+65.41	132.15	−10 50.3	+ 9.7			
U	12 28.2	21 40 45	−65.34	131.88	− 8 49.9	+10.4			

Febr. 1 12h Apogaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
Febr. 8.0	21 14 12.61	25 32.31	−10 50 52.3	+1 56 18.4	8.21771	+214	15 28.0
8.5	21 39 44.92	25 30.13	8 54 33.9	2 3 53.1	8.21985	204	15 32.5
9.0	22 5 15.05	25 30.15	6 50 40.8	2 9 58.0	8.22189	193	15 36.9
9.5	22 30 45.20	25 33.00	4 40 42.8	2 14 26.1	8.22382	181	15 41.1
10.0	22 56 18.20	25 39.17	2 26 16.7	2 17 10.9	8.22563	168	15 45.0
10.5	23 21 57.37	25 49.02	−0 9 5.8	2 18 8.8	8.22731	153	15 48.7
11.0	23 47 46.39	26 2.79	+2 9 3.0	2 17 14.1	8.22884	137	15 52.1
11.5	0 13 49.18	26 20.49	4 26 17.1	2 14 25.0	8.23021	124	15 55.1
12.0	0 40 9.67	26 41.81	6 40 42.1	2 9 38.2	8.23145	108	15 57.8
12.5	1 6 51.48	27 6.40	8 50 20.3	+2 2 53.9	8.23253	+ 94	16 0.2
13.0	1 33 57.88	27 33.52	+10 53 14.2	1 54 11.4	8.23347	82	16 2.3
13.5	2 1 31.40	28 2.15	12 47 25.6	1 43 33.8	8.23429	68	16 4.1
14.0	2 29 33.55	28 31.03	14 30 59.4	1 31 5.3	8.23497	55	16 5.6
14.5	2 58 4.58	28 58.60	16 2 4.7	1 16 53.8	8.23552	42	16 6.8
15.0	3 27 3.18	29 23.25	17 18 58.5	1 1 10.7	8.23594	30	16 7.7
15.5	3 56 26.43	29 43.33	18 20 9.2	0 44 10.8	8.23624	15	16 8.4
16.0	4 26 9.76	29 57.26	19 4 20.0	0 26 14.2	8.23639	+ 1	16 8.8
16.5	4 56 7.02	30 3.98	19 30 34.2	+0 7 42.6	8.23640	− 14	16 8.8
17.0	5 26 11.00	30 2.66	19 38 16.8	−0 10 58.0	8.23626	32	16 8.5
17.5	5 56 13.66	29 53.29	19 27 18.8	−0 29 21.7	8.23594	− 50	16 7.7
18.0	6 26 6.95	29 36.40	+18 57 57.1	0 47 2.6	8.23544	70	16 6.6
18.5	6 55 43.35	29 12.91	18 10 54.5	1 3 37.3	8.23474	91	16 5.1
19.0	7 24 56.26	28 44.24	17 7 17.2	1 18 45.4	8.23383	112	16 3.1
19.5	7 53 40.50	28 12.10	15 48 31.8	1 32 11.4	8.23271	133	16 0.6
20.0	8 21 52.60	27 37.96	14 16 20.4	1 43 44.3	8.23138	156	15 57.6
20.5	8 49 30.56	27 3.48	12 32 36.1	1 53 17.0	8.22982	176	15 54.2
21.0	9 16 34.04	26 29.95	10 39 19.1	2 0 47.8	8.22806	196	15 50.3
21.5	9 43 3.99	25 58.47	8 38 31.3	2 6 18.5	8.22610	212	15 46.1
22.0	10 9 2.46	25 29.87	6 32 12.8	2 9 51.9	8.22398	226	15 41.5
22.5	10 34 32.33	25 4.73	4 22 20.9	−2 11 34.8	8.22172	−235	15 36.6
23.0	10 59 37.06	24 43.43	+ 2 10 46.1	2 11 34.1	8.21937	242	15 31.5
23.5	11 24 20.49	24 26.12	− 0 0 48.0	2 9 58.4	8.21695	244	15 26.3
24.0	11 48 46.61	24 12.92	2 10 46.4	2 6 55.4	8.21451	242	15 21.1
24.5	12 12 59.53	24 3.67	4 17 41.8	2 2 33.2	8.21209	235	15 16.0
25.0	12 37 3.20	23 58.20	6 20 15.0	1 56 59.2	8.20974	224	15 11.1
25.5	13 1 1.40	23 56.22	8 17 14.2	1 50 20.9	8.20750	209	15 6.4
26.0	13 24 57.62	23 57.48	10 7 35.1	1 42 44.0	8.20541	189	15 2.0
26.5	13 48 55.10	24 1.48	11 50 19.1	1 34 13.7	8.20352	166	14 58.1
27.0	14 12 56.58	24 7.86	13 24 32.8	1 24 55.8	8.20186	140	14 54.7
27.5	14 37 4.44		14 49 28.6		8.20046		14 51.8

Febr. 8 2ʰ 15ᵐ.1 Neumond. Febr. 15 3ʰ 50ᵐ.2 Erstes Viertel. Febr. 22 1ʰ 57ᵐ.0 Vollmond.

Im Meridian von Berlin.

Datum und Culmination	Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Vergl.-Sterne Gr.
	h m	h m s	s	s	° ′	′			
Febr. 8 *O*	0 3.9	21 14 21	+65.41	132.15	−10 50.3	+ 9.7			
U	12 28.2	21 40 45	−65.34	131.88	− 8 49.9	+10.4			
9 *O*	0 52.5	22 7 7	−65.33	131.78	− 6 41.4	+11.0			
U	13 16.9	22 33 29	−65.37	131.93	− 4 26.5	+11.4			
10 *O*	1 41.3	22 59 54	−65.51	132.36	− 2 7.1	+11.7			
U	14 5.8	23 26 27	−65.74	133.15	+ 0 15.0	+11.9			
11 *O*	2 30.5	23 53 12	−66.06	134.30	+ 2 37.9	+11.9			
U	14 55.5	0 20 13	−66.49	135.83	+ 4 59.4	+11.7			
12 *O*	3 20.8	0 47 34	−67.00	137.73	+ 7 17.4	+11.3			
U	15 46.5	1 15 20	−67.59	139.94	+ 9 29.8	+10.7			
							h m	° ′	
13 *O*	4 12.7	1 43 35	−68.24	142.44	+11 34.4	+10.0	1 8.6	+ 7 3	4.2
U	16 39.4	2 12 21	−68.92	145.10	+13 29.0	+ 9.1	1 16.2	+11 1	6.5
14 *O*	5 6.7	2 41 39	−69.60	147.80	+15 11.4	+ 8.0	1 57.3	+13 0	6.5
U	17 34.5	3 11 29	−70.25	150.41	+16 39.6	+ 6.7	2 27.5	+14 36	6.5
15 *O*	6 2.7	3 41 49	−70.81	152.74	+17 51.8	+ 5.3	2 59.2	+15 29	6.5
U	18 31.4	4 12 34	−71.25	154.63	+18 46.4	+ 3.8	3 21.5	+18 25	6.5
16 *O*	7 0.5	4 43 38	−71.55	155.92	+19 21.9	+ 2.2	4 6.9	+17 2	6.4
U	19 29.7	5 14 53	−71.66	156.49	+19 37.6	+ 0.5	4 14.7	+18 30	5.9
17 *O*	7 58.9	5 46 11	−71.57	156.27	+19 33.1	− 1.2	5 13.5	+20 2	6.5
U	20 28.0	6 17 21	−71.30	155.26	+19 8.5	− 2.9	5 21.5	+17 53	5.4
18 *O*	8 56.9	6 48 14	−70.85	153.53	+18 24.5	− 4.4	6 15.7	+17 48	6.5
U	21 25.3	7 18 42	−70.25	151.19	+17 22.3	− 5.9	6 23.2	+20 16	4.0
19 *O*	9 53.2	7 48 39	−69.54	148.40	+16 3.4	− 7.2	7 12.5	+16 43	3.6
U	22 20.5	8 18 1	−68.75	145.31	+14 29.8	− 8.4	7 26.2	+17 18	5.6
20 *O*	10 47.2	8 46 44	−67.93	142.10	+12 43.7	− 9.3	8 12.7	+15 59	6.5
U	23 13.2	9 14 50	−67.11	138.91	+10 46.9	−10.1	8 21.4	+12 59	5.6
21 *O*	11 38.6	9 42 17	−66.33	135.86	+ 8 42.0	−10.7	9 2.5	+11 4	5.0
—	—	—	—	—	—	—	9 23.2	+ 9 29	5.6
22 *U*	0 3.5	10 9 10	−65.61	133.07	+ 6 31.6	−11.1	9 55.1	+ 8 31	5.0
O	12 27.8	10 35 31	+64.98	130.48	+ 4 17.3	−11.3	10 17.9	+ 7 2	6.5
23 *U*	0 51.6	11 1 24	+64.44	128.37	+ 2 1.3	−11.4	11 1.9	+ 2 29	5.7
O	13 15.1	11 26 54	+64.00	126.63	− 0 14.5	−11.3	11 3.8	+ 0 28	5.5
24 *U*	1 38.3	11 52 6	+63.66	125.28	− 2 28.3	−11.0	11 44.1	+ 0 14	6.5
O	14 1.2	12 17 3	+63.43	124.32	− 4 38.7	−10.7	12 1.6	− 2 35	6.4
25 *U*	2 24.0	12 41 51	+63.30	123.72	− 6 44.1	−10.2	12 42.5	− 5 46	6.1
O	14 46.6	13 6 34	+63.26	123.46	− 8 43.4	− 9.7	12 49.3	− 9 0	5.0
26 *U*	3 9.3	13 31 15	+63.30	123.50	−10 35.4	− 9.0	13 27.8	− 9 40	5.5
O	15 32.0	13 55 59	+63.43	123.84	−12 19.0	− 8.2	13 40.7	−11 56	6.0
27 *U*	3 54.8	14 20 48	+63.61	124.38	−13 53.3	− 7.4	14 13.8	−12 55	4.6
O	16 17.7	14 45 45	+63.82	125.12	−15 17.5	− 6.6	14 40.6	−15 3	6.2

Febr. 16 7h Perigaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app. h m s	Diff. m s	Decl. app. ° ′ ″	Diff. ° ′ ″	Log. sin. A. H. Par.	Diff.	Halbm. ′ ″
Febr. 27.0	14 12 56.58	24 7.86	−13 24 32.8	−1 24 55.8	8.20186	−140	14 54.7
27.5	14 37 4.44	24 16.09	14 49 28.6	1 14 54.3	8.20046	110	14 51.8
28.0	15 1 20.53	24 25.66	16 4 22.9	1 4 12.6	8.19936	78	14 49.6
28.5	15 25 46.19	24 36.05	17 8 35.5	0 52 55.5	8.19858	45	14 48.0
März 1.0	15 50 22.24	24 46.70	18 1 31.0	0 41 5.9	8.19813	− 11	14 47.1
1.5	16 15 8.94	24 57.15	18 42 36.9	0 28 48.3	8.19802	+ 24	14 46.8
2.0	16 40 6.09	25 6.86	19 11 25.2	0 16 7.3	8.19826	60	14 47.3
2.5	17 5 12.95	25 15.52	19 27 32.5	−0 3 7.6	8.19886	94	14 48.5
3.0	17 30 28.47	25 22.82	19 30 40.1	+0 10 5.0	8.19980	127	14 50.5
3.5	17 55 51.29	25 28.60	19 20 35.1	+0 23 24.8	8.20107	+159	14 53.1
4.0	18 21 19.89	25 32.78	−18 57 10.3	0 36 43.8	8.20266	189	14 56.4
4.5	18 46 52.67	25 35.55	18 20 26.5	0 49 55.0	8.20455	213	15 0.3
5.0	19 12 28.22	25 37.14	17 30 31.5	1 2 50.0	8.20668	236	15 4.7
5.5	19 38 5.36	25 37.90	16 27 41.5	1 15 19.1	8.20904	255	15 9.6
6.0	20 3 43.26	25 38.30	15 12 22.4	1 27 13.0	8.21159	267	15 15.0
6.5	20 29 21.56	25 38.85	13 45 9.4	1 38 21.4	8.21426	275	15 20.6
7.0	20 55 0.41	25 40.17	12 6 48.0	1 48 33.8	8.21701	280	15 26.5
7.5	21 20 40.58	25 42.81	10 18 14.2	1 57 38.6	8.21981	276	15 32.5
8.0	21 46 23.39	25 47.33	8 20 35.6	2 5 25.4	8.22257	269	15 38.4
8.5	22 12 10.72	25 54.20	6 15 10.2	+2 11 42.8	8.22526	+255	15 44.2
9.0	22 38 4.92	26 3.83	− 4 3 27.4	2 16 20.0	8.22781	238	15 49.8
9.5	23 4 8.75	26 16.50	− 1 47 7.4	2 19 7.4	8.23019	215	15 55.0
10.0	23 30 25.25	26 32.31	+ 0 32 0.0	2 19 55.6	8.23234	189	15 59.7
10.5	23 56 57.56	26 51.28	2 51 55.6	2 18 37.6	8.23423	160	16 3.9
11.0	0 23 48.84	27 13.04	5 10 33.2	2 15 7.7	8.23583	131	16 7.5
11.5	0 51 1.88	27 37.14	7 25 40.9	2 9 23.4	8.23714	98	16 10.4
12.0	1 18 39.02	28 2.80	9 35 4.3	2 1 24.8	8.23812	67	16 12.6
12.5	1 46 41.82	28 28.94	11 36 29.1	1 51 15.5	8.23879	37	16 14.1
13.0	2 15 10.76	28 54.36	13 27 44.6	1 39 2.8	8.23916	+ 8	16 14.9
13.5	2 44 5.12	29 17.62	15 6 47.4	+1 24 58.6	8.23924	− 18	16 15.1
14.0	3 13 22.74	29 37.14	+16 31 46.0	1 9 18.1	8.23906	42	16 14.7
14.5	3 42 59.88	29 51.58	17 41 4.1	0 52 20.9	8.23864	65	16 13.8
15.0	4 12 51.46	29 59.69	18 33 25.0	0 34 29.3	8.23799	82	16 12.3
15.5	4 42 51.15	30 0.66	19 7 54.3	+0 16 7.7	8.23717	98	16 10.5
16.0	5 12 51.81	29 54.20	19 24 2.0	−0 2 18.3	8.23619	112	16 8.3
16.5	5 42 46.01	29 40.43	19 21 43.7	0 20 24.1	8.23507	122	16 5.8
17.0	6 12 26.44	29 20.09	19 1 19.6	0 37 46.6	8.23385	133	16 3.1
17.5	6 41 46.53	28 54.35	18 23 33.0	0 54 6.4	8.23252	141	16 0.1
18.0	7 10 40.88	28 24.59	17 29 26.6	1 9 7.4	8.23111	148	15 57.0
18.5	7 39 5.47		16 20 19.2		8.22963		15 53.8

März 1 23h 33.0m Letztes Viertel. März 9 15h 43.8m Neumond. März 16 11h 6.4m Erstes Viertel.

Im Meridian von Berlin.

Datum und Culmination		Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Vergl.-Sterne Gr.
		h m	h m s	s	s	° ′	′	h m	° ′	
Febr. 27	U	3 54.8	14 20 48	+63.61	124.38	−13 53.3	− 7.4	14 13.8	−12 55	4.6
	O	16 17.7	14 45 45	+63.82	125.12	−15 17.5	− 6.6	14 40.6	−15 3	6.2
28	U	4 40.8	15 10 51	+64.07	125.99	−16 30.7	− 5.6	15 9.1	−17 24	6.5
	O	17 4.0	15 36 8	+64.35	126.95	−17 32.4	− 4.6	15 15.4	−17 48	6.0
März 1	U	5 27.5	16 1 37	+64.62	127.93	−18 21.7	− 3.6	15 59.8	−19 32	3.0
	O	17 51.1	16 27 18	+64.87	128.89	−18 58.2	− 2.5	16 6.3	−19 12	4.5
2	U	6 14.9	16 53 10	+65.10	129.78	−19 21.4	− 1.4	16 36.2	−19 44	5.7
	O	18 38.9	17 19 12	+65.31	130.58	−19 30.9	− 0.2	16 56.1	−18 45	6.5
3	U	7 3.0	17 45 22	+65.46	131.24	−19 26.4	+ 1.0	17 50.2	−18 47	6.5
	O	19 27.3	18 11 40	+65.57	131.75	−19 7.6	+ 2.2	17 54.2	−20 20	6.5
4	U	7 51.7	18 38 4	+65.65	132.11	−18 34.6	+ 3.4	18 37.2	−19 23	6.5
	O	20 16.1	19 4 30	+65.68	132.35	−17 47.5	+ 4.5	18 57.3	−19 23	5.9
5	U	8 40.5	19 30 59	+65.67	132.46	−16 46.4	+ 5.7			
	O	21 5.0	19 57 29	+65.65	132.52	−15 31.8	+ 6.8			
6	U	9 29.5	20 24 0	+65.62	132.56	−14 4.4	+ 7.8			
	O	21 53.9	20 50 31	+65.61	132.62	−12 24.8	+ 8.8			
7	U	10 18.4	21 17 3	+65.62	132.78	−10 34.1	+ 9.7			
	O	22 43.0	21 43 38	+65.67	133.09	− 8 33.6	+10.4			
8	U	11 7.6	22 10 18	+65.78	133.59	− 6 24.5	+11.1			
	O	23 32.4	22 37 5	+65.94	134.34	− 4 8.6	+11.6			
9	U	11 57.3	23 4 3	+66.20	135.37	− 1 47.7	+11.9			
		—	—	—	—	—	—			
10	O	0 22.4	23 31 14	−66.53	136.64	+ 0 36.3	+12.1			
	U	12 47.9	23 58 44	−66.96	138.26	+ 3 1.2	+12.0			
11	O	1 13.7	0 26 35	−67.45	140.18	+ 5 24.6	+11.8			
	U	13 39.9	0 54 50	−68.01	142.34	+ 7 44.0	+11.4			
12	O	2 6.6	1 23 33	−68.61	144.69	+ 9 57.1	+10.7			
	U	14 33.7	1 52 44	−69.24	147.14	+12 1.2	+ 9.9			
13	O	3 1.3	2 22 25	−69.87	149.55	+13 53.9	+ 8.9			
	U	15 29.4	2 52 34	−70.44	151.80	+15 33.0	+ 7.6			
14	O	3 58.0	3 23 8	−70.93	153.73	+16 56.5	+ 6.2	2 46.1	+14 41	5.5
	U	16 26.9	3 54 2	−71.30	155.18	+18 2.5	+ 4.7	2 59.2	+15 29	6.5
15	O	4 55.9	4 25 11	−71.52	156.03	+18 49.8	+ 3.1	3 47.6	+17 2	6.0
	U	17 25.1	4 56 25	−71.57	156.18	+19 17.5	+ 1.5	3 55.2	+17 55	5.7
16	O	5 54.2	5 27 36	−71.44	155.60	+19 25.2	− 0.2	4 45.7	+18 40	5.1
	U	18 23.2	5 58 36	−71.12	154.31	+19 13.1	− 1.8	4 59.8	+19 40	6.5
17	O	6 51.8	6 29 16	−70.65	152.38	+18 41.8	− 3.4	5 58.1	+20 8	4.8
	U	19 20.0	6 59 29	−70.03	149.94	+17 52.4	− 4.8	6 6.2	+19 49	5.6
18	O	7 47.6	7 29 12	−69.33	147.11	+16 46.2	− 6.2	6 57.0	+16 49	6.5
	U	20 14.7	7 58 18	−68.54	144.07	+15 24.9	− 7.4	7 7.8	+16 20	5.4

März 1 10h Apogaeum. März 13 9h Perigaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
März 18.0	7 10 40.88	28 24.59	+17 29 26.6	−1 9 7.4	8.23111	−148	15 57.0
18.5	7 39 5.47	27 52.28	16 20 19.2	1 22 36.7	8.22963	154	15 53.8
19.0	8 6 57.75	27 18.93	14 57 42.5	1 34 26.5	8.22809	161	15 50.4
19.5	8 34 16.68	26 45.90	13 23 16.0	1 44 32.1	8.22648	167	15 46.9
20.0	9 1 2.58	26 14.34	11 38 43.9	1 52 50.7	8.22481	172	15 43.3
20.5	9 27 16.92	25 45.14	9 45 53.2	1 59 22.6	8.22309	178	15 39.5
21.0	9 53 2.06	25 18.97	7 46 30.6	2 4 9.2	8.22131	183	15 35.7
21.5	10 18 21.03	24 56.35	5 42 21.4	2 7 14.4	8.21948	186	15 31.8
22.0	10 43 17.38	24 37.46	3 35 7.0	2 8 40.8	8.21762	190	15 27.8
22.5	11 7 54.84	24 22.46	+ 1 26 26.2	−2 8 33.9	8.21572	−192	15 23.7
23.0	11 32 17.30	24 11.31	− 0 42 7.7	2 6 57.8	8.21380	193	15 19.6
23.5	11 56 28.61	24 3.83	2 49 5.5	2 3 57.8	8.21187	192	15 15.5
24.0	12 20 32.44	23 59.83	4 53 3.3	1 59 39.0	8.20995	187	15 11.5
24.5	12 44 32.27	23 58.95	6 52 42.3	1 54 6.9	8.20808	181	15 7.6
25.0	13 8 31.22	24 0.84	8 46 49.2	1 47 26.8	8.20627	172	15 3.8
25.5	13 32 32.06	24 5.02	10 34 16.0	1 39 43.9	8.20455	160	15 0.3
26.0	13 56 37.08	24 11.06	12 13 59.9	1 31 3.9	8.20295	146	14 57.0
26.5	14 20 48.14	24 18.39	13 45 3.8	1 21 32.1	8.20149	127	14 54.0
27.0	14 45 6.53	24 26.56	15 6 35.9	1 11 14.8	8.20022	107	14 51.3
27.5	15 9 33.09	24 35.02	16 17 50.7	−1 0 16.6	8.19915	− 82	14 49.1
28.0	15 34 8.11	24 43.31	−17 18 7.3	0 48 44.0	8.19833	57	14 47.5
28.5	15 58 51.42	24 50.93	18 6 51.3	0 36 42.9	8.19776	− 28	14 46.3
29.0	16 23 42.35	24 57.59	18 43 34.2	0 24 18.6	8.19748	+ 2	14 45.7
29.5	16 48 39.94	25 3.05	19 7 52.8	−0 11 37.9	8.19750	35	14 45.8
30.0	17 13 42.99	25 7.17	19 19 30.7	+0 1 13.6	8.19785	67	14 46.5
30.5	17 38 50.16	25 9.89	19 18 17.1	0 14 9.7	8.19852	101	14 47.8
31.0	18 4 0.05	25 11.35	19 4 7.4	0 27 4.7	8.19953	135	14 49.9
31.5	18 29 11.40	25 11.82	18 37 2.7	0 39 52.3	8.20088	168	14 52.7
April 1.0	18 54 23.22	25 11.64	17 57 10.4	0 52 26.4	8.20256	201	14 56.2
1.5	19 19 34.86	25 11.26	17 4 44.0	+1 4 41.0	8.20457	+229	15 0.3
2.0	19 44 46.12	25 11.18	−16 0 3.0	1 16 29.7	8.20686	257	15 5.1
2.5	20 9 57.30	25 11.97	14 43 33.3	1 27 45.7	8.20943	281	15 10.4
3.0	20 35 9.27	25 14.19	13 15 47.6	1 38 21.2	8.21224	301	15 16.3
3.5	21 0 23.46	25 18.44	11 37 26.4	1 48 8.3	8.21525	317	15 22.7
4.0	21 25 41.90	25 25.17	9 49 18.1	1 56 57.5	8.21842	325	15 29.5
4.5	21 51 7.07	25 34.92	7 52 20.6	2 4 38.5	8.22167	329	15 36.5
5.0	22 16 41.99	25 48.04	5 47 42.1	2 10 59.8	8.22496	325	15 43.6
5.5	22 42 30.03	26 4.79	3 36 42.3	2 15 49.2	8.22821	316	15 50.7
6.0	23 8 34.82	26 25.35	− 1 20 53.1	2 18 53.9	8.23137	297	15 57.6
6.5	23 35 0.17		+ 0 58 0.8		8.23434		16 4.2

März 23 16h 14.9m Vollmond. März 31 19h 17.6m Letztes Viertel.

Im Meridian von Berlin.

Datum und Culmination		Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Gr.
		h m	h m s	s	s	° '	'	h m	° '	
März 18	O	7 47.6	7 29 12	—69.33	147.11	+16 46.2	— 6.2	6 57.0	+16 49	6.5
	U	20 14.7	7 58 18	—68.54	144.07	+15 24.9	— 7.4	7 7.8	+16 20	5.4
19	O	8 41.1	8 26 47	—67.74	140.96	+13 50.4	— 8.4	7 56.0	+16 44	6.4
	U	21 7.0	8 54 39	—66.94	137.91	+12 4.6	— 9.2	8 3.3	+13 56	6.5
20	O	9 32.2	9 21 56	—66.18	135.02	+10 9.6	— 9.9	8 53.2	+12 14	4.3
	U	21 56.9	9 48 40	—65.49	132.40	+ 8 7.3	—10.4	9 2.5	+11 4	5.0
21	O	10 21.1	10 14 54	—64.86	130.09	+ 5 59.6	—10.8	9 36.0	+10 20	3.8
	U	22 44.9	10 40 42	—64.32	128.12	+ 3 48.5	—11.0	9 51.3	+ 9 24	6.0
22	O	11 8.3	11 6 9	—63.90	126.52	+ 1 35.7	—11.1	10 40.1	+ 3 0	6.5
	U	23 31.4	11 31 19	—63.56	125.29	— 0 37.0	—11.0	10 55.5	+ 4 9	5.0
23	O	11 54.3	11 56 17	—63.33	124.43	— 2 48.1	—10.8	11 32.0	— 0 17	4.5
	—	—	—	—	—	—	—	11 44.1	+ 0 14	6.5
24	U	0 17.1	12 21 7	+63.19	123.89	— 4 56.0	—10.5	12 22.9	— 4 4	5.7
	O	12 39.8	12 45 52	+63.14	123.68	— 6 59.2	—10.0	12 26.7	— 4 31	6.3
25	U	1 2.5	13 10 36	+63.17	123.76	— 8 56.4	— 9.5	13 4.7	— 9 48	6.5
	O	13 25.3	13 35 23	+63.28	124.08	—10 46.5	— 8.8	13 20.1	—10 39	1.2
26	U	1 48.1	14 0 15	+63.44	124.58	—12 28.2	— 8.1	14 3.3	—11 22	6.5
	O	14 11.1	14 25 13	+63.63	125.22	—14 0.6	— 7.3	14 13.8	—12 55	4.6
27	U	2 34.2	14 50 20	+63.85	125.95	—15 22.7	— 6.4	14 45.5	—15 38	3.0
	O	14 57.4	15 15 36	+64.09	126.73	—16 33.7	— 5.4	15 1.2	—15 53	5.4
28	U	3 20.8	15 41 1	+64.32	127.51	—17 32.9	— 4.4	15 33.3	—18 59	5.7
	O	15 44.3	16 6 35	+64.55	128.22	—18 19.6	— 3.4	15 44.3	—17 36	6.5
29	U	4 7.9	16 32 17	+64.75	128.85	—18 53.4	— 2.3	16 21.4	—18 14	5.0
	O	16 31.7	16 58 7	+64.91	129.37	—19 13.8	— 1.1	16 35.9	—17 33	5.2
30	U	4 55.6	17 24 1	+65.03	129.76	—19 20.6	— 0.0	17 14.2	—17 39	6.0
	O	17 19.6	17 50 0	+65.12	130.02	—19 13.6	+ 1.2	17 18.9	—18 21	6.3
31	U	5 43.5	18 16 1	+65.17	130.14	—18 52.8	+ 2.3	18 15.6	—18 54	var.
	O	18 7.5	18 42 3	+65.18	130.19	—18 18.3	+ 3.5	18 22.3	—17 52	6.7
April 1	U	6 31.5	19 8 5	+65.17	130.16	—17 30.2	+ 4.6	19 1.4	—18 53	6.5
	O	18 55.5	19 34 7	+65.15	130.13	—16 28.9	+ 5.7	19 16.0	—18 2	3.9
2	U	7 19.5	20 0 9	+65.13	130.13	—15 14.7	+ 6.7	19 52.4	—15 45	5.0
	O	19 43.5	20 26 11	+65.14	130.21	—13 48.3	+ 7.7	20 15.3	—15 6	6.7
3	U	8 7.5	20 52 14	+65.18	130.44	—12 10.3	+ 8.6	20 47.7	—11 57	6.5
	O	20 31.6	21 18 22	+65.25	130.88	—10 21.6	+ 9.5	21 4.3	—11 46	4.6
4	U	8 55.8	21 44 36	+65.40	131.57	— 8 23.1	+10.3			
	O	21 20.2	22 11 0	+65.61	132.55	— 6 16.0	+10.9			
5	U	9 44.8	22 37 38	+65.91	133.87	— 4 1.7	+11.4			
	O	22 9.6	23 4 34	+66.31	135.54	— 1 42.0	+11.8			
6	U	10 34.9	23 31 52	+66.80	137.58	+ 0 41.5	+12.1			
	O	23 0.6	23 59 36	+67.37	139.97	+ 3 6.5	+12.1			

März 29 5h Apogaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
April 6.0	23 8 34.82	26 25.35	− 1 20 53.1	+2 18 53.9	8.23137	+297	15 57.6
6.5	23 35 0.17	26 49.61	+ 0 58 0.8	2 20 0.7	8.23434	274	16 4.2
7.0	0 1 49.78	27 17.31	3 18 1.5	2 18 57.5	8.23708	243	16 10.3
7.5	0 29 7.09	27 47.84	5 36 59.0	2 15 33.6	8.23951	206	16 15.7
8.0	0 56 54.93	28 20.39	7 52 32.6	2 9 41.3	8.24157	166	16 20.3
8.5	1 25 15.32	28 53.75	10 2 13.9	2 1 17.7	8.24323	123	16 24.1
9.0	1 54 9.07	29 26.27	12 3 31.6	1 50 24.0	8.24446	76	16 26.9
9.5	2 23 35.34	29 56.29	13 53 55.6	1 37 8.7	8.24522	+ 30	16 28.6
10.0	2 53 31.63	30 21.81	15 31 4.3	1 21 46.5	8.24552	− 15	16 29.3
10.5	3 23 53.44		16 52 50.8		8.24537		16 29.0
		30 40.87		+1 4 39.0		− 58	
11.0	3 54 34.31	30 51.94	+17 57 29.8	0 46 13.5	8.24479	97	16 27.7
11.5	4 25 26.25	30 53.88	18 43 43.3	0 27 1.3	8.24382	132	16 25.5
12.0	4 56 20.13	30 46.20	19 10 44.6	+0 7 35.1	8.24250	163	16 22.5
12.5	5 27 6.33	30 29.26	19 18 19.7	−0 11 33.4	8.24087	187	16 18.8
13.0	5 57 35.59	30 4.01	19 6 46.3	0 29 54.9	8.23900	207	16 14.6
13.5	6 27 39.60	29 32.04	18 36 51.4	0 47 5.3	8.23693	221	16 10.0
14.0	6 57 11.64	28 55.24	17 49 46.1	1 2 47.6	8.23472	231	16 5.0
14.5	7 26 6.88	28 15.59	16 46 58.5	1 16 49.0	8.23241	236	15 59.9
15.0	7 54 22.47	27 35.07	15 30 9.5	1 29 3.2	8.23005	239	15 54.7
15.5	8 21 57.54		14 1 6.3		8.22766		15 49.5
		26 55.28		−1 39 27.8		−237	
16.0	8 48 52.82	26 17.62	+12 21 38.5	1 48 4.3	8.22529	234	15 44.3
16.5	9 15 10.44	25 43.19	10 33 34.2	1 54 55.4	8.22295	228	15 39.2
17.0	9 40 53.63	25 12.67	8 38 38.8	2 0 5.9	8.22067	222	15 34.3
17.5	10 6 6.30	24 46.56	6 38 32.9	2 3 40.3	8.21845	214	15 29.5
18.0	10 30 52.86	24 25.09	4 34 52.6	2 5 44.2	8.21631	207	15 25.0
18.5	10 55 17.95	24 8.31	2 29 8.4	2 6 21.2	8.21424	198	15 20.6
19.0	11 19 26.26	23 56.15	+ 0 22 47.2	2 5 35.8	8.21226	189	15 16.4
19.5	11 43 22.41	23 48.34	− 1 42 48.6	2 3 32.1	8.21037	180	15 12.4
20.0	12 7 10.75	23 44.58	3 46 20.7	2 0 13.1	8.20857	171	15 8.6
20.5	12 30 55.33		5 46 33.8		8.20686		15 5.1
		23 44.52		−1 55 42.0		−161	
21.0	12 54 39.85	23 47.57	− 7 42 15.8	1 50 2.0	8.20525	151	15 1.7
21.5	13 18 27.42	23 53.31	9 32 17.8	1 43 16.4	8.20374	141	14 58.6
22.0	13 42 20.73	24 1.09	11 15 34.2	1 35 28.9	8.20233	129	14 55.7
22.5	14 6 21.82	24 10.28	12 51 3.1	1 26 43.6	8.20104	116	14 53.0
23.0	14 30 32.10	24 20.24	14 17 46.7	1 17 5.2	8.19988	101	14 50.6
23.5	14 54 52.34	24 30.28	15 34 51.9	1 6 39.1	8.19887	86	14 48.6
24.0	15 19 22.62	24 39.81	16 41 31.0	0 55 30.9	8.19801	68	14 46.8
24.5	15 44 2.43	24 48.23	17 37 1.9	0 43 47.8	8.19733	49	14 45.4
25.0	16 8 50.66	24 55.08	18 20 49.7	0 31 37.2	8.19684	28	14 44.4
25.5	16 33 45.74		18 52 26.9		8.19656		14 43.9

April 8 2h 43m.7 Neumond. April 14 18h 19m.3 Erstes Viertel. April 22 7h 43m.2 Vollmond.

Im Meridian von Berlin.

Datum und Culmination	Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1^h Länge	Decl.	Bew. in 1^h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Vergl.-Sterne Gr.
	h m	h m s	s	"	° '	'	h m	° '	
April 6 U	10 34.9	23 31 52	+66.80	137.58	+ 0 41.5	+12.1			
O	23 0.6	23 59 36	+67.37	139.97	+ 3 6.5	+12.1			
7 U	11 26.8	0 27 51	+68.04	142.68	+ 5 30.6	+11.9			
O	23 53.6	0 56 40	+68.76	145.64	+ 7 51.4	+11.5			
8 U	12 21.0	1 26 5	—69.51	148.63	+10 5.9	+10.9			
—	—	—	—	—	—	—			
9 O	0 49.0	1 56 8	—70.28	151.73	+12 11.4	+10.0			
U	13 17.6	2 26 48	—71.00	154.68	+14 5.1	+ 8.9			
10 O	1 46.8	2 58 0	—71.64	157.27	+15 44.2	+ 7.6			
U	14 16.4	3 29 41	—72.15	159.31	+17 6.5	+ 6.1			
11 O	2 46.3	4 1 42	—72.47	160.60	+18 9.9	+ 4.4			
U	15 16.4	4 33 52	—72.61	161.03	+18 53.0	+ 2.7			
12 O	3 46.6	5 6 2	—72.52	160.51	+19 15.2	+ 1.0			
U	16 16.5	5 38 0	—72.19	159.06	+19 16.4	— 0.8			
13 O	4 46.0	6 9 36	—71.68	156.78	+18 57.0	— 2.4	5 31.8	+21 5	3.0
U	17 15.0	6 40 39	—70.98	153.82	+18 18.3	— 4.0	5 41.7	+17 42	5.5
14 O	5 43.4	7 11 4	—70.16	150.38	+17 21.7	— 5.4	6 36.7	+17 44	5.1
U	18 11.0	7 40 46	—69.26	146.68	+16 9.0	— 6.7	6 41.7	+18 18	6.5
15 O	6 37.9	8 9 42	—68.32	142.89	+14 42.4	— 7.8	7 33.8	+17 54	5.2
U	19 4.1	8 37 54	—67.39	139.19	+13 3.7	— 8.7	7 51.5	+16 3	5.9
16 O	7 29.5	9 5 22	—66.49	135.72	+11 15.1	— 9.4	8 37.8	+13 2	5.6
U	19 54.3	9 32 11	—65.67	132.58	+ 9 18.6	—10.0	8 41.6	+12 28	5.8
17 O	8 18.5	9 58 24	—64.93	129.82	+ 7 16.0	—10.4	9 26.7	+10 9	5.4
U	20 42.2	10 24 7	—64.30	127.49	+ 5 9.1	—10.7	9 36.0	+10 20	3.8
18 O	9 5.4	10 49 24	—63.77	125.61	+ 2 59.7	—10.9	10 17.9	+ 7 2	6.5
U	21 28.3	11 14 22	—63.38	124.19	+ 0 49.4	—10.9	10 38.3	+ 5 16	6.1
19 O	9 51.0	11 39 6	—63.08	123.19	— 1 20.4	—10.8	11 13.9	+ 2 11	6.5
U	22 13.6	12 3 40	—62.90	122.59	— 3 28.3	—10.5	11 18.3	+ 0 40	6.2
20 O	10 36.0	12 28 9	—62.81	122.37	— 5 32.7	—10.2	12 1.0	— 2 35	6.4
U	22 58.5	12 52 38	—62.83	122.48	— 7 32.6	— 9.8	12 13.2	— 3 24	6.8
21 O	11 21.0	13 17 10	—62.92	122.86	— 9 26.5	— 9.2	12 49.3	— 9 0	5.0
U	23 43.6	13 41 48	—63.08	123.49	—11 13.3	— 8.6	13 3.5	— 8 28	5.9
22 O	12 6.3	14 6 35	+63.28	124.31	—12 51.9	— 7.8	13 40.8	—11 56	6.0
—	—	—	—	—	—	—	14 3.3	—11 22	6.5
23 U	0 29.2	14 31 31	+63.52	125.19	—14 21.1	— 7.0	14 40.6	—15 3	6.2
O	12 52.3	14 56 39	+63.77	126.12	—15 40.1	— 6.1	14 44.0	—13 44	5.4
24 U	1 15.6	15 21 58	+64.03	127.03	—16 47.9	— 5.2	15 22.8	—16 22	6.2
O	13 39.0	15 47 27	+64.26	127.85	—17 43.8	— 4.2	15 27.4	—16 31	5.4
25 U	2 2.6	16 13 5	+64.48	128.53	—18 27.1	— 3.1	16 13.4	—19 59	6.0
O	14 26.4	16 38 50	+64.64	129.04	—18 57.4	— 2.0	16 18.4	—19 49	4.6

April 10 2^h Perigaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
April 25.0	16 8 50.66	24 55.08	−18 20 49.7	−0 31 37.2	8.19684	−28	14 44.4
25.5	16 33 45.74	25 0.02	18 52 26.9	0 19 5.9	8.19656	−4	14 43.9
26.0	16 58 45.76	25 2.90	19 11 32.8	−0 6 22.2	8.19652	+20	14 43.8
26.5	17 23 48.66	25 3.67	19 17 55.0	+0 6 26.2	8.19672	48	14 44.2
27.0	17 48 52.33	25 2.47	19 11 28.8	0 19 12.3	8.19720	75	14 45.2
27.5	18 13 54.80	24 59.68	18 52 16.5	0 31 49.1	8.19795	105	14 46.7
28.0	18 38 54.48	24 55.72	18 20 27.4	0 44 10.2	8.19900	135	14 48.8
28.5	19 3 50.20	24 51.22	17 36 17.2	0 56 9.7	8.20035	166	14 51.6
29.0	19 28 41.42	24 46.76	16 40 7.5	1 7 42.7	8.20201	197	14 55.0
29.5	19 53 28.18	24 43.10	15 32 24.8	+1 18 44.0	8.20398	+227	14 59.1
30.0	20 18 11.28	24 40.95	−14 13 40.8	1 29 9.4	8.20625	255	15 3.8
30.5	20 42 52.23	24 41.02	12 44 31.4	1 38 53.3	8.20880	282	15 9.1
Mai 1.0	21 7 33.25	24 43.96	11 5 38.1	1 47 50.3	8.21162	305	15 15.0
1.5	21 32 17.21	24 50.38	9 17 47.8	1 55 54.8	8.21467	326	15 21.5
2.0	21 57 7.59	25 0.80	7 21 53.0	2 2 58.3	8.21793	342	15 28.4
2.5	22 22 8.39	25 15.68	5 18 54.7	2 8 52.7	8.22135	351	15 35.8
3.0	22 47 24.07	25 35.35	3 10 2.0	2 13 26.9	8.22486	355	15 43.4
3.5	23 12 59.42	25 59.98	− 0 56 35.1	2 16 28.6	8.22841	352	15 51.1
4.0	23 38 59.40	26 29.53	+ 1 19 53.5	2 17 44.6	8.23193	343	15 58.9
4.5	0 5 28.93	27 3.70	3 37 38.1	+2 17 0.5	8.23536	+323	16 6.5
5.0	0 32 32.63	27 41.90	+ 5 54 38.6	2 14 2.1	8.23859	296	16 13.7
5.5	1 0 14.53	28 23.17	8 8 40.7	2 8 36.7	8.24155	263	16 20.3
6.0	1 28 37.70	29 6.02	10 17 17.4	2 0 35.3	8.24418	222	16 26.3
6.5	1 57 43.72	29 48.60	12 17 52.7	1 49 53.1	8.24640	174	16 31.3
7.0	2 27 32.32	30 28.55	14 7 45.8	1 36 33.3	8.24814	122	16 35.3
7.5	2 58 0.87	31 3.34	15 44 19.1	1 20 47.7	8.24936	66	16 38.1
8.0	3 29 4.21	31 30.34	17 5 6.8	1 2 56.8	8.25002	+ 11	16 39.6
8.5	4 0 34.55	31 47.26	18 8 3.6	0 43 31.7	8.25013	− 45	16 39.9
9.0	4 32 21.81	31 52.48	18 51 35.3	0 23 8.4	8.24968	98	16 38.9
9.5	5 4 14.29	31 45.31	19 14 43.7	+0 2 28.2	8.24870	−148	16 36.6
10.0	5 35 59.60	31 26.01	+19 17 11.9	−0 17 48.6	8.24722	191	16 33.2
10.5	6 7 25.61	30 56.06	18 59 23.3	0 37 5.0	8.24531	229	16 28.9
11.0	6 38 21.67	30 17.56	18 22 18.3	0 54 51.0	8.24302	258	16 23.7
11.5	7 8 39.23	29 33.14	17 27 27.3	1 10 46.0	8.24044	283	16 17.8
12.0	7 38 12.37	28 45.41	16 16 41.3	1 24 37.4	8.23761	299	16 11.5
12.5	8 6 57.78	27 56.91	14 52 3.9	1 36 20.6	8.23462	308	16 4.8
13.0	8 34 54.69	27 9.67	13 15 43.3	1 45 56.3	8.23154	312	15 58.0
13.5	9 2 4.36	26 25.41	11 29 47.0	1 53 30.7	8.22842	310	15 51.1
14.0	9 28 29.77	25 45.32	9 36 16.3	1 59 11.4	8.22532	303	15 44.4
14.5	9 54 15.09		7 37 4.9		8.22229		15 37.8

April 30 11h 51.6m Letztes Viertel. Mai 7 11h 38.8m Neumond.

Im Meridian von Berlin.

Datum und Culmination		Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Gr.
		h m	h m s	s	s	° ′	′	h m	° ′	
April 25	U	2 2.6	16 13 5	+64.48	128.53	−18 27.1	− 3.1	16 13.4	−19 59	6.0
	O	14 26.4	16 38 50	+64.64	129.04	−18 57.4	− 2.0	16 18.4	−19 49	4.6
26	U	2 50.2	17 4 41	+64.76	129.36	−19 14.2	− 0.9	16 59.0	−20 21	6.5
	O	15 14.0	17 30 34	+64.82	129.47	−19 17.4	+ 0.3	17 14.2	−17 39	6.0
27	U	3 37.9	17 56 27	+64.84	129.39	−19 7.0	+ 1.4	17 54.2	−20 20	6.5
	O	16 1.7	18 22 19	+64.80	129.15	−18 43.0	+ 2.6	18 9.4	−20 25	6.2
28	U	4 25.4	18 48 6	+64.74	128.80	−18 5.6	+ 3.7	18 37.2	−19 23	6.5
	O	16 49.1	19 13 50	+64.67	128.38	−17 15.1	+ 4.9	18 57.3	−19 23	5.9
29	U	5 12.7	19 39 28	+64.58	127.97	−16 12.1	+ 5.9	19 38.0	−15 42	5.5
	O	17 36.3	20 5 1	+64.49	127.62	−14 57.0	+ 6.8	19 52.4	−15 45	5.0
30	U	5 59.7	20 30 31	+64.45	127.43	−13 30.4	+ 7.7	20 28.8	−14 4	6.2
	O	18 23.1	20 56 0	+64.45	127.44	−11 53.1	+ 8.5	20 45.3	−12 54	6.3
Mai 1	U	6 46.6	21 21 31	+64.51	127.74	−10 5.8	+ 9.3	21 20.0	−10 10	5.7
	O	19 10.2	21 47 7	+64.67	128.35	− 8 9.5	+10.1	21 32.6	− 8 18	4.8
2	U	7 33.9	22 12 52	+64.91	129.36	− 6 5.1	+10.7	22 12.0	− 5 53	5.9
	O	19 57.9	22 38 52	+65.26	130.82	− 3 53.9	+11.2	22 19.0	− 5 20	5.8
3	U	8 22.2	23 5 13	+65.72	132.71	− 1 37.3	+11.6	22 53.2	− 2 55	6.3
	O	20 46.9	23 31 58	+66.29	135.09	+ 0 43.1	+11.8	23 21.9	+ 0 43	5.0
4	U	9 12.1	23 59 16	+66.99	137.96	+ 3 5.5	+11.9			
	O	21 38.0	0 27 9	+67.78	141.26	+ 5 27.8	+11.8			
5	U	10 4.6	0 55 45	+68.66	144.93	+ 7 47.5	+11.5			
	O	22 31.9	1 25 7	+69.60	148.86	+10 1.9	+10.9			
6	U	11 0.0	1 55 17	+70.56	152.91	+12 8.2	+10.1			
	O	23 28.9	2 26 14	+71.49	156.84	+14 3.3	+ 9.0			
7	U	11 58.6	2 57 56	−72.33	160.28	+15 44.1	+ 7.7			
—		—	—	—	—	—	—			
8	O	0 28.9	3 30 20	−73.03	163.23	+17 8.0	+ 6.2			
	U	12 59.7	4 3 12	−73.51	165.30	+18 12.4	+ 4.5			
9	O	1 30.8	4 36 23	−73.75	166.27	+18 55.6	+ 2.7			
	U	14 2.0	5 9 38	−73.71	166.03	+19 16.6	+ 0.8			
10	O	2 33.0	5 42 42	−73.40	164.57	+19 15.1	− 1.0			
	U	15 3.6	6 15 22	−72.82	161.99	+18 51.7	− 2.8			
11	O	3 33.6	6 47 25	−72.03	158.52	+18 7.8	− 4.5			
	U	16 2.9	7 18 43	−71.08	154.42	+17 5.3	− 5.9			
12	O	4 31.3	7 49 8	−70.04	149.96	+15 46.3	− 7.2	7 12.5	+16 43	3.6
	U	16 58.7	8 18 39	−68.94	145.42	+14 13.4	− 8.3	7 26.2	+17 18	5.6
13	O	5 25.3	8 47 17	−67.87	141.00	+12 28.9	− 9.2	8 12.7	+15 59	6.5
	U	17 51.0	9 15 3	−66.84	136.88	+10 35.3	− 9.8	8 21.3	+12 59	5.6
14	O	6 15.9	9 42 1	−65.89	133.15	+ 8 34.6	−10.3	9 2.5	+11 4	5.0
	U	18 40.2	10 8 19	−65.06	129.92	+ 6 29.0	−10.6	9 23.2	+ 9 29	5.6

April 25 20^h Apogaeum. Mai 8 8^h Perigaeum.

Mittlerer Mittag und Mitternacht.

Datum		AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
		h m s	m s	° ′ ″	° ′ ″			′ ″
Mai	14.0	9 28 29.77		+ 9 36 16.3		8.22532		15 44.4
			25 45.32		−1 59 11.4		−303	
	14.5	9 54 15.09		7 37 4.9		8.22229		15 37.8
			25 10.16		2 3 7.5		293	
	15.0	10 19 25.25		5 33 57.4		8.21936		15 31.5
			24 40.41		2 5 27.5		280	
	15.5	10 44 5.66		3 28 29.9		8.21656		15 25.5
			24 16.23		2 6 19.6		264	
	16.0	11 8 21.89		+ 1 22 10.3		8.21392		15 19.9
			23 57.63		2 5 50.9		247	
	16.5	11 32 19.52		− 0 43 40.6		8.21145		15 14.7
			23 44.40		2 4 7.6		229	
	17.0	11 56 3.92		2 47 48.2		8.20916		15 9.9
			23 36.27		2 1 13.8		209	
	17.5	12 19 40.19		4 49 2.0		8.20707		15 5.5
			23 32.78		1 57 13.3		192	
	18.0	12 43 12.97		6 46 15.3		8.20515		15 1.5
			23 33.49		1 52 8.9		173	
	18.5	13 6 46.46		8 38 24.2		8.20342		14 57.9
			23 37.86		−1 46 2.9		−153	
	19.0	13 30 24.32		−10 24 27.1		8.20189		14 54.8
			23 45.16		1 38 57.8		136	
	19.5	13 54 9.48		12 3 24.9		8.20053		14 52.0
			23 54.81		1 30 55.0		118	
	20.0	14 18 4.29		13 34 19.9		8.19935		14 49.6
			24 5.98		1 21 58.1		101	
	20.5	14 42 10.27		14 56 18.0		8.19834		14 47.5
			24 17.91		1 12 10.2		84	
	21.0	15 6 28.18		16 8 28.2		8.19750		14 45.8
			24 29.80		1 1 35.5		66	
	21.5	15 30 57.98		17 10 3.7		8.19684		14 44.4
			24 40.91		0 50 19.7		50	
	22.0	15 55 38.89		18 0 23.4		8.19634		14 43.4
			24 50.53		0 38 28.9		33	
	22.5	16 20 29.42		18 38 52.3		8.19601		14 42.7
			24 58.07		0 26 10.0		− 14	
	23.0	16 45 27.49		19 5 2.3		8.19587		14 42.4
			25 3.09		0 13 33.4		+ 4	
	23.5	17 10 30.58		19 18 35.7		8.19591		14 42.5
			25 5.36		−0 0 44.6		+ 23	
	24.0	17 35 35.94		−19 19 20.3		8.19614		14 43.0
			25 4.85		+0 12 5.4		43	
	24.5	18 0 40.79		19 7 14.9		8.19657		14 43.9
			25 1.75		0 24 48.1		65	
	25.0	18 25 42.54		18 42 26.8		8.19722		14 45.2
			24 56.44		0 37 15.5		87	
	25.5	18 50 38.98		18 5 11.3		8.19809		14 47.0
			24 49.50		0 49 20.2		110	
	26.0	19 15 28.48		17 15 51.1		8.19919		14 49.2
			24 41.61		1 0 56.3		134	
	26.5	19 40 10.09		16 14 54.8		8.20053		14 52.0
			24 33.53		1 11 57.3		160	
	27.0	20 4 43.62		15 2 57.5		8.20213		14 55.3
			24 26.15		1 22 18.7		186	
	27.5	20 29 9.77		13 40 38.8		8.20399		14 59.1
			24 20.26		1 31 57.3		211	
	28.0	20 53 30.03		12 8 41.5		8.20610		15 3.5
			24 16.67		1 40 48.4		236	
	28.5	21 17 46.70		10 27 53.1		8.20846		15 8.4
			24 16.16		+1 48 48.9		+261	
	29.0	21 42 2.86		− 8 39 4.2		8.21107		15 13.9
			24 19.41		1 55 54.4		284	
	29.5	22 6 22.27		6 43 9.8		8.21391		15 19.9
			24 27.04		2 2 0.2		304	
	30.0	22 30 49.31		4 41 9.6		8.21695		15 26.3
			24 39.62		2 7 0.0		322	
	30.5	22 55 28.93		2 34 9.6		8.22017		15 33.2
			24 57.45		2 10 46.9		337	
	31.0	23 20 26.38		− 0 23 22.7		8.22354		15 40.5
			25 20.95		2 13 10.8		345	
	31.5	23 45 47.33		+ 1 49 48.1		8.22699		15 48.0
			25 50.15		2 14 1.5		349	
Juni	1.0	0 11 37.48		4 3 49.6		8.23048		15 55.6
			26 24.98		2 13 6.5		345	
	1.5	0 38 2.46		6 16 56.1		8.23393		16 3.3
			27 4.96		2 10 11.9		337	
	2.0	1 5 7.42		8 27 8.0		8.23730		16 10.8
			27 49.33		2 5 4.9		319	
	2.5	1 32 56.75		10 32 12.9		8.24049		16 17.9

Mai 14 2h 33m.3 Erstes Viertel. Mai 21 23h 39m.7 Vollmond. Mai 30 0h 54m.0 Letztes Viertel.

Im Meridian von Berlin.

Datum und Culmination		Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Vergl.-Sterne Gr.
		h m	h m s	s	s	° '	'	h m	° '	
Mai 14	O	6 15.9	9 42 1	—65.89	133.15	+ 8 34.6	—10.3	9 2.5	+11 4	5.0
	U	18 40.2	10 8 19	—65.06	129.92	+ 6 29.0	—10.6	9 23.2	+ 9 29	5.6
15	O	7 3.9	10 34 0	—64.34	127.21	+ 4 20.3	—10.8	9 55.1	+ 8 31	5.0
	U	19 27.0	10 59 12	—63.75	125.03	+ 2 10.1	—10.9	10 17.9	+ 7 2	6.5
16	O	7 49.8	11 24 2	—63.30	123.38	— 0 0.1	—10.8	10 55.5	+ 4 9	5.0
	U	20 12.4	11 48 35	—62.97	122.23	— 2 8.8	—10.6	11 1.9	+ 2 29	5.7
17	O	8 34.7	12 12 57	—62.76	121.57	— 4 14.8	—10.4	11 44.1	+ 0 14	6.5
	U	20 56.9	12 37 14	—62.67	121.34	— 6 16.9	—10.0	12 1.0	— 2 35	6.4
18	O	9 19.2	13 1 31	—62.69	121.49	— 8 13.8	— 9.5	12 34.5	— 5 34	6.5
	U	21 41.5	13 25 51	—62.78	121.97	—10 4.6	— 8.9	12 42.5	— 5 46	6.1
19	O	10 3.9	13 50 19	—62.96	122.72	—11 48.0	— 8.3	13 20.1	—10 39	1.2
	U	22 26.5	14 14 57	—63.18	123.66	—13 23.0	— 7.5	13 27.9	— 9 40	5.5
20	O	10 49.3	14 39 48	—63.44	124.72	—14 48.7	— 6.7	14 3.3	—11 22	6.5
	U	23 12.4	15 4 51	—63.71	125.82	—16 4.0	— 5.8	14 13.9	—12 55	4.6
21	O	11 35.6	15 30 8	—63.98	126.89	—17 8.2	— 4.9	15 1.2	—15 53	5.4
	U	23 59.0	15 55 37	+64.23	127.90	—18 0.3	— 3.8	15 6.4	—15 47	6.5
22	O	12 22.6	16 21 17	+64.45	128.69	—18 39.9	— 2.7	15 54.9	—16 15	5.6
—		—	—	—	—	—	—	15 59.8	—19 32	3.0
23	U	0 46.4	16 47 4	+64.60	129.26	—19 6.3	— 1.6	16 36.2	—19 44	5.7
	O	13 10.3	17 12 58	+64.70	129.58	—19 19.2	— 0.5	16 56.2	—18 45	6.5
24	U	1 34.2	17 38 53	+64.74	129.62	—19 18.5	+ 0.6	17 50.2	—18 47	6.5
	O	13 58.0	18 4 47	+64.70	129.41	—19 4.1	+ 1.7	17 54.2	—20 20	6.5
25	U	2 21.9	18 30 38	+64.63	128.97	—18 36.1	+ 2.9	18 25.7	—18 28	5.2
	O	14 45.6	18 56 22	+64.50	128.36	—17 54.9	+ 4.0	18 37.2	—19 23	6.5
26	U	3 9.2	19 21 58	+64.35	127.64	—17 1.0	+ 5.0	19 16.2	—18 29	6.1
	O	15 32.6	19 47 26	+64.18	126.90	—15 54.8	+ 6.0	19 35.2	—16 31	5.5
27	U	3 55.8	20 12 45	+64.04	126.21	—14 37.2	+ 6.9	20 15.5	—15 5	3.4
	O	16 19.0	20 37 56	+63.91	125.63	—13 8.7	+ 7.8	20 25.6	—15 23	6.2
28	U	4 42.0	21 3 1	+63.84	125.27	—11 30.2	+ 8.6	21 4.3	—11 46	4.6
	O	17 5.0	21 28 4	+63.84	125.20	— 9 42.7	+ 9.3	21 9.0	—11 1	6.5
29	U	5 28.0	21 53 7	+63.93	125.49	— 7 47.1	+ 9.9	21 41.1	— 9 44	6.2
	O	17 51.2	22 18 17	+64.11	126.19	— 5 44.4	+10.5	21 58.2	— 7 0	5.6
30	U	6 14.5	22 43 37	+64.42	127.35	— 3 35.7	+10.9	22 32.7	— 4 44	5.5
	O	18 38.1	23 9 14	+64.84	129.02	— 1 22.2	+11.3	22 53.2	— 2 55	6.3
31	U	7 2.1	23 35 15	+65.40	131.23	+ 0 54.5	+11.5	23 37.1	+ 1 14	4.7
	O	19 26.5	0 1 45	+66.09	134.00	+ 3 12.9	+11.6	23 41.4	+ 2 57	5.2
Juni 1	U	7 51.6	0 28 51	+66.90	137.30	+ 5 31.2	+11.5	0 27.4	+ 6 25	5.7
	O	20 17.4	0 56 41	+67.84	141.11	+ 7 47.3	+11.2	0 43.2	+ 6 46	6.0
2	U	8 43.9	1 25 18	+68.85	145.33	+ 9 58.8	+10.7			
	O	21 11.4	1 54 47	+69.92	149.82	+12 3.0	+10.0			

Mai 23 4^h Apogaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
Juni 2.0	1h 5m 7s.42	27m 49s.33	+ 8° 27′ 8″.0	+2° 5′ 4″.9	8.23730	+319	16′ 10″.8
2.5	1 32 56.75	28 36.76	10 32 12.9	1 57 33.4	8.24049	292	16 17.9
3.0	2 1 33.51	29 25.52	12 29 46.3	1 47 28.3	8.24341	259	16 24.5
3.5	2 30 59.03	30 13.25	14 17 14.6	1 34 46.4	8.24600	217	16 30.4
4.0	3 1 12.28	30 57.15	15 52 1.0	1 19 33.2	8.24817	169	16 35.4
4.5	3 32 9.43	31 34.23	17 11 34.2	1 2 2.9	8.24986	118	16 39.3
5.0	4 3 43.66	32 1.58	18 13 37.1	0 42 39.7	8.25104	+ 58	16 42.0
5.5	4 35 45.24	32 16.81	18 56 16.8	0 21 59.6	8.25162	0	16 43.3
6.0	5 8 2.05	32 18.42	19 18 16.4	+0 0 44.4	8.25162	− 60	16 43.3
6.5	5 40 20.47	32 6.17	19 19 0.8	−0 20 21.4	8.25102	−117	16 41.9
7.0	6 12 26.64	31 40.97	+18 58 39.4	0 40 33.6	8.24985	171	16 39.2
7.5	6 44 7.61	31 4.91	18 18 5.8	0 59 15.0	8.24814	218	16 35.3
8.0	7 15 12.52	30 20.73	17 18 50.8	1 15 56.7	8.24596	260	16 30.3
8.5	7 45 33.25	29 31.38	16 2 54.1	1 30 21.3	8.24336	293	16 24.4
9.0	8 15 4.63	28 39.90	14 32 32.8	1 42 20.3	8.24043	320	16 17.8
9.5	8 43 44.53	27 48.82	12 50 12.5	1 51 54.0	8.23723	338	16 10.6
10.0	9 11 33.35	27 0.16	10 58 18.5	1 59 8.7	8.23385	347	16 3.1
10.5	9 38 33.51	26 15.47	8 59 9.8	2 4 14.7	8.23038	352	15 55.4
11.0	10 4 48.98	25 35.84	6 54 55.1	2 7 24.4	8.22686	347	15 47.7
11.5	10 30 24.82	25 1.77	4 47 30.7	−2 8 48.9	8.22339	−337	15 40.2
12.0	10 55 26.59	24 33.65	+ 2 38 41.8	2 8 40.8	8.22002	324	15 32.9
12.5	11 20 0.24	24 11.44	+ 0 30 1.0	2 7 10.4	8.21678	306	15 26.0
13.0	11 44 11.68	23 55.02	− 1 37 9.4	2 4 25.5	8.21372	284	15 19.5
13.5	12 8 6.70	23 44.10	3 41 34.9	2 0 33.6	8.21088	262	15 13.5
14.0	12 31 50.80	23 38.29	5 42 8.5	1 55 39.6	8.20826	236	15 8.0
14.5	12 55 29.09	23 37.09	7 37 48.1	1 49 47.6	8.20590	210	15 3.1
15.0	13 19 6.18	23 39.92	9 27 35.7	1 43 0.6	8.20380	185	14 58.7
15.5	13 42 46.10	23 46.15	11 10 36.3	1 35 21.3	8.20195	159	14 54.9
16.0	14 6 32.25	23 55.07	12 45 57.6	1 26 51.2	8.20036	133	14 51.6
16.5	14 30 27.32	24 5.89	14 12 48.8	−1 17 32.5	8.19903	−108	14 48.9
17.0	14 54 33.21	24 17.81	−15 30 21.3	1 7 27.9	8.19795	84	14 46.7
17.5	15 18 51.02	24 30.01	16 37 49.2	0 56 40.6	8.19711	62	14 45.0
18.0	15 43 21.03	24 41.60	17 34 29.8	0 45 15.3	8.19649	40	14 43.7
18.5	16 8 2.63	24 51.88	18 19 45.1	0 33 17.0	8.19609	− 20	14 42.9
19.0	16 32 54.51	25 0.11	18 53 2.1	0 20 52.8	8.19589	+ 1	14 42.5
19.5	16 57 54.62	25 5.84	19 13 54.9	−0 8 10.9	8.19590	18	14 42.5
20.0	17 23 0.46	25 8.66	19 22 5.8	+0 4 41.0	8.19608	37	14 42.9
20.5	17 48 9.12	25 8.49	19 17 24.8	0 17 33.3	8.19645	55	14 43.6
21.0	18 13 17.61	25 5.44	18 59 51.5	0 30 16.0	8.19700	72	14 44.7
21.5	18 38 23.05		18 29 35.5		8.19772		14 46.2

Juni 5 19h 4m.5 Neumond. Juni 12 12h 47m.4 Erstes Viertel. Juni 20 15h 10m.3 Vollmond.

Im Meridian von Berlin.

Datum und Culmination		Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Vergl.-Sterne Gr.
Juni 2	U	8h 43.9m	1h 25m 18s	+68.85s	145.33s	+ 9° 58.8'	+10.7'			
	O	21 11.4	1 54 47	+69.92	149.82	+12 3.0	+10.0			
3	U	9 39.7	2 25 11	+70.99	154.41	+13 57.2	+ 9.0			
	O	22 9.0	2 56 30	+72.02	158.81	+15 38.3	+ 7.8			
4	U	10 39.1	3 28 39	+72.92	162.75	+17 3.5	+ 6.4			
	O	23 9.9	4 1 31	+73.66	165.91	+18 9.9	+ 4.7			
5	U	11 41.2	4 34 55	+74.14	167.99	+18 55.4	+ 2.9			
—		—	—	—	—	—	—			
6	O	0 12.9	5 8 37	−74.32	168.78	+19 18.5	+ 1.0			
	U	12 44.6	5 42 20	−74.20	168.24	+19 18.4	− 1.0			
7	O	1 16.0	6 15 49	−73.77	166.36	+18 55.3	− 2.9			
	U	13 46.9	6 48 47	−73.08	163.30	+18 10.4	− 4.6			
8	O	2 17.1	7 21 3	−72.16	159.36	+17 5.6	− 6.2			
	U	14 46.4	7 52 27	−71.12	154.82	+15 43.2	− 7.5			
9	O	3 14.8	8 22 55	−69.98	150.01	+14 5.9	− 8.6			
	U	15 42.3	8 52 25	−68.84	145.20	+12 16.6	− 9.5			
10	O	4 8.9	9 20 59	−67.73	140.60	+10 17.9	−10.2	8h 53.1m	+12° 14'	4.3
	U	16 34.5	9 48 39	−66.69	136.39	+ 8 12.3	−10.7	9 2.5	+11 4	5.0
11	O	4 59.3	10 15 32	−65.76	132.65	+ 6 2.2	−11.0	9 51.3	+ 9 24	6.0
	U	17 23.5	10 41 43	−64.95	129.47	+ 3 49.7	−11.1	9 55.1	+ 8 31	5.0
12	O	5 47.0	11 7 20	−64.28	126.85	+ 1 36.6	−11.1	10 40.1	+ 3 0	6.5
	U	18 10.1	11 32 29	−63.74	124.80	− 0 35.6	−10.9	10 55.5	+ 4 9	5.0
13	O	6 32.9	11 57 16	−63.34	123.30	− 2 45.5	−10.7	11 32.0	− 0 17	4.5
	U	18 55.4	12 21 49	−63.07	122.31	− 4 51.7	−10.3	11 44.1	+ 0 14	6.5
14	O	7 17.8	12 46 14	−62.93	121.82	− 6 53.1	− 9.9	12 18.3	− 4 26	6.5
	U	19 40.1	13 10 35	−62.89	121.75	− 8 48.7	− 9.4	12 26.6	− 4 31	6.3
15	O	8 2.5	13 34 57	−62.94	122.05	−10 37.4	− 8.8	13 4.7	− 9 48	6.5
	U	20 24.9	13 59 25	−63.08	122.66	−12 18.3	− 8.1	13 20.1	−10 39	1.2
16	O	8 47.5	14 24 3	−63.28	123.54	−13 50.5	− 7.3	14 3.3	−11 22	6.5
	U	21 10.3	14 48 51	−63.52	124.57	−15 12.9	− 6.5	14 13.9	−12 55	4.6
17	O	9 33.3	15 13 53	−63.78	125.68	−16 24.9	− 5.5	14 45.5	−15 38	3.0
	U	21 56.5	15 39 8	−64.04	126.79	−17 25.6	− 4.5	15 1.2	−15 53	5.4
18	O	10 19.9	16 4 36	−64.28	127.83	−18 14.1	− 3.5	15 33.3	−18 59	5.7
	U	22 43.5	16 30 16	−64.50	128.71	−18 50.0	− 2.4	15 44.3	−17 36	6.5
19	O	11 7.3	16 56 4	−64.65	129.39	−19 12.8	− 1.3	16 21.4	−18 14	5.0
	U	23 31.2	17 22 0	−64.75	129.81	−19 22.0	− 0.2	16 34.9	−20 13	6.5
20	O	11 55.1	17 47 59	−64.77	129.94	−19 17.5	+ 0.9	17 14.2	−17 39	6.0
—		—	—	—	—	—	—	17 18.9	−18 21	6.3
21	U	0 19.1	18 13 58	+64.74	129.78	−18 59.2	+ 2.1	18 15.7	−18 54	var.
	O	12 43.0	18 39 53	+64.64	129.36	−18 27.4	+ 3.2	18 19.6	−20 36	4.9

Juni 5 18h Perigaeum. Juni 19 6h Apogaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
Juni 21.0	18 13 17.61	25 5.44	−18 59 51.5	+0 30 16.0	8.19700	+72	14 44.7
21.5	18 38 23.05	24 59.86	18 29 35.5	0 42 40.8	8.19772	87	14 46.2
22.0	19 3 22.91	24 52.21	17 46 54.7	0 54 39.0	8.19859	105	14 48.0
22.5	19 28 15.12	24 43.27	16 52 15.7	1 6 2.5	8.19964	123	14 50.1
23.0	19 52 58.39	24 33.75	15 46 13.2	1 16 45.4	8.20087	139	14 52.6
23.5	20 17 32.14	24 24.50	14 29 27.8	1 26 41.8	8.20226	157	14 55.5
24.0	20 41 56.64	24 16.41	13 2 46.0	1 35 47.1	8.20383	175	14 58.8
24.5	21 6 13.05	24 10.29	11 26 58.9	1 43 57.6	8.20558	193	15 2.4
25.0	21 30 23.34	24 6.94	9 43 1.3	1 51 9.6	8.20751	211	15 6.4
25.5	21 54 30.28	24 7.10	7 51 51.7	+1 57 20.2	8.20962	+230	15 10.8
26.0	22 18 37.38	24 11.42	− 5 54 31.5	2 2 25.9	8.21192	246	15 15.7
26.5	22 42 48.80	24 20.43	3 52 5.6	2 6 22.1	8.21438	263	15 20.9
27.0	23 7 9.23	24 34.60	− 1 45 43.5	2 9 4.2	8.21701	278	15 26.5
27.5	23 31 43.83	24 54.25	+ 0 23 20.7	2 10 25.8	8.21979	289	15 32.4
28.0	23 56 38.08	25 19.58	2 33 46.5	2 10 19.3	8.22268	299	15 38.6
28.5	0 21 57.66	25 50.58	4 44 5.8	2 8 36.0	8.22567	305	15 45.1
29.0	0 47 48.24	26 26.98	6 52 41.8	2 5 5.8	8.22872	307	15 51.8
29.5	1 14 15.22	27 8.16	8 57 47.6	1 59 38.7	8.23179	302	15 58.5
30.0	1 41 23.38	27 53.16	10 57 26.3	1 52 4.4	8.23481	292	16 5.2
30.5	2 9 16.54	28 40.56	12 49 30.7	+1 42 15.2	8.23773	+275	16 11.7
Juli 1.0	2 37 57.10	29 28.35	+14 31 45.9	1 30 5.8	8.24048	253	16 17.9
1.5	3 7 25.45	30 14.15	16 1 51.7	1 15 37.8	8.24301	222	16 23.6
2.0	3 37 39.60	30 55.14	17 17 29.5	0 59 0.3	8.24523	184	16 28.7
2.5	4 8 34.74	31 28.48	18 16 29.8	0 40 30.5	8.24707	142	16 32.9
3.0	4 40 3.22	31 51.64	18 57 0.3	+0 20 35.9	8.24849	93	16 36.1
3.5	5 11 54.86	32 2.59	19 17 36.2	−0 0 8.1	8.24942	+ 40	16 38.3
4.0	5 43 57.45	32 0.41	19 17 28.1	0 21 0.7	8.24982	− 14	16 39.2
4.5	6 15 57.86	31 45.29	18 56 27.4	0 41 18.3	8.24968	70	16 38.8
5.0	6 47 43.15	31 18.54	18 15 9.1	1 0 22.0	8.24898	123	16 37.2
5.5	7 19 1.69	30 42.35	17 14 47.1	−1 17 37.6	8.24775	−174	16 34.4
6.0	7 49 44.04	29 59.38	+15 57 9.5	1 32 40.8	8.24601	221	16 30.4
6.5	8 19 43.42	29 12.52	14 24 28.7	1 45 17.1	8.24380	262	16 25.4
7.0	8 48 55.94	28 24.35	12 39 11.6	1 55 20.6	8.24118	295	16 19.5
7.5	9 17 20.29	27 37.18	10 43 51.0	2 2 54.2	8.23823	321	16 12.9
8.0	9 44 57.47	26 52.72	8 40 56.8	2 8 5.7	8.23502	340	16 5.7
8.5	10 11 50.19	26 12.29	6 32 51.1	2 11 6.5	8.23162	350	15 58.2
9.0	10 38 2.48	25 36.77	4 21 44.6	2 12 10.1	8.22812	353	15 50.5
9.5	11 3 39.25	25 6.58	+ 2 9 34.5	2 11 29.8	8.22459	348	15 42.8
10.0	11 28 45.83	24 41.93	− 0 1 55.3	2 9 18.0	8.22111	339	15 35.3
10.5	11 53 27.76		2 11 13.3		8.21772		15 28.0

Juni 28 10h 45.4m Letztes Viertel. Juli 5 1h 52.8m Neumond.

Im Meridian von Berlin.

Datum und Culmination		Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Decl.	Gr.
		h m	h m s	s	s	° ′	′	h m	° ′	
Juni 21	U	0 19.1	18 13 58	+64.74	129.78	−18 59.2	+ 2.1	18 15.7	−18 54	var.
	O	12 43.0	18 39 53	+64.64	129.36	−18 27.4	+ 3.2	18 19.6	−20 36	4.9
22	U	1 6.8	19 5 42	+64.48	128.72	−17 42.3	+ 4.3	19 1.5	−18 53	6.5
	O	13 30.4	19 31 22	+64.30	127.93	−16 44.6	+ 5.3	19 16.0	−18 2	3.9
23	U	1 53.8	19 56 52	+64.09	127.06	−15 34.8	+ 6.3	19 52.4	−15 45	5.0
	O	14 17.1	20 22 12	+63.90	126.19	−14 13.7	+ 7.2	20 15.3	−15 6	6.7
24	U	2 40.3	20 47 21	+63.72	125.41	−12 42.2	+ 8.0	20 47.8	−11 57	6.5
	O	15 3.3	21 12 23	+63.59	124.79	−11 1.3	+ 8.8	21 4.3	−11 46	4.6
25	U	3 26.2	21 37 18	+63.52	124.42	− 9 11.9	+ 9.4	21 32.6	− 8 18	4.8
	O	15 49.0	22 2 10	+63.53	124.38	− 7 15.2	+10.0	21 39.8	− 9 32	5.2
26	U	4 11.8	22 27 4	+63.65	124.72	− 5 12.2	+10.5	22 19.1	− 5 20	5.8
	O	16 34.8	22 52 5	+63.87	125.49	− 3 4.3	+10.9	22 32.7	− 4 44	5.5
27	U	4 58.0	23 17 18	+64.22	126.76	− 0 52.6	+11.1	23 21.9	+ 0 43	5.0
	O	17 21.5	23 42 48	+64.70	128.54	+ 1 21.5	+11.2	23 31.4	+ 1 34	5.6
28	U	5 45.4	0 8 44	+65.30	130.87	+ 3 36.4	+11.2	0 20.4	+ 1 24	5.8
	O	18 9.8	0 35 10	+66.04	133.74	+ 5 50.5	+11.1	0 27.4	+ 6 25	5.7
29	U	6 34.8	1 2 14	+66.89	137.13	+ 8 1.9	+10.8	1 3.3	+ 9 23	6.5
	O	19 0.5	1 30 1	+67.85	141.00	+10 8.5	+10.3	1 8.6	+ 7 3	4.2
30	U	7 27.1	1 58 37	+68.88	145.23	+12 8.1	+ 9.6	1 45.7	+10 33	5.8
	O	19 54.5	2 28 5	+69.94	149.68	+13 58.2	+ 8.7	1 54.2	+11 49	6.2
Juli 1	U	8 22.8	2 58 27	+71.00	154.16	+15 36.1	+ 7.6	2 46.1	+14 41	5.5
	O	20 52.0	3 29 42	+71.97	158.40	+16 59.3	+ 6.3	2 59.2	+15 29	6.5
2	U	9 22.0	4 1 45	+72.83	162.10	+18 5.1	+ 4.7			
	O	21 52.6	4 34 27	+73.47	164.98	+18 51.2	+ 3.0			
3	U	10 23.8	5 7 38	+73.87	166.77	+19 16.0	+ 1.1			
	O	22 55.2	5 41 4	+73.98	167.30	+19 18.3	− 0.8			
4	U	11 26.5	6 14 29	+73.79	166.54	+18 57.9	− 2.6			
	O	23 57.5	6 47 37	+73.33	164.52	+18 15.3	− 4.4			
5	U	12 28.1	7 20 15	−72.62	161.60	+17 12.0	− 6.1			
—	—	—	—	—	—	—	—			
6	O	0 58.0	7 52 11	−71.73	157.80	+15 50.2	− 7.5			
	U	13 27.1	8 23 18	−70.73	153.51	+14 12.3	− 8.7			
7	O	1 55.3	8 53 32	−69.66	149.00	+12 21.3	− 9.7			
	U	14 22.6	9 22 52	−68.59	144.54	+10 20.0	−10.5			
8	O	2 49.0	9 51 20	−67.57	140.30	+ 8 11.2	−11.0			
	U	15 14.6	10 18 59	−66.63	136.44	+ 5 57.6	−11.3			
9	O	3 39.5	10 45 55	−65.79	133.04	+ 3 41.5	−11.4			
	U	16 3.8	11 12 13	−65.07	130.15	+ 1 24.9	−11.4			
10	O	4 27.5	11 37 59	−64.49	127.79	− 0 50.3	−11.2	11 8.8	+ 0 28	5.5
	U	16 50.8	12 3 21	−64.03	125.97	− 3 2.5	−10.9	11 13.9	+ 2 11	6.5

Juli 4 3^h Perigaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
Juli 10.0	11 28 45.83	24 41.93	− 0 1 55.3	−2 9 18.0	8.22111	−339	15 35.3
10.5	11 53 27.76	24 22.81	2 11 13.3	2 5 46.4	8.21772	323	15 28.0
11.0	12 17 50.57	24 9.03	4 16 59.7	2 1 4.0	8.21449	303	15 21.1
11.5	12 41 59.60	24 0.23	6 18 3.7	1 55 19.0	8.21146	281	15 14.7
12.0	13 5 59.83	23 56.05	8 13 22.7	1 48 37.5	8.20865	253	15 8.8
12.5	13 29 55.88	23 55.91	10 2 0.2	1 41 4.1	8.20612	224	15 3.5
13.0	13 53 51.79	23 59.29	11 43 4.3	1 32 42.8	8.20388	195	14 58.9
13.5	14 17 51.08	24 5.51	13 15 47.1	1 23 36.7	8.20193	164	14 54.9
14.0	14 41 56.59	24 13.87	14 39 23.8	1 13 48.3	8.20029	134	14 51.5
14.5	15 6 10.46	24 23.62	15 53 12.1	−1 3 19.8	8.19895	−103	14 48.7
15.0	15 30 34.08	24 34.02	−16 56 31.9	0 52 15.3	8.19792	73	14 46.6
15.5	15 55 8.10	24 44.23	17 48 47.2	0 40 38.3	8.19719	45	14 45.1
16.0	16 19 52.33	24 53.59	18 29 25.5	0 28 32.8	8.19674	− 18	14 44.2
16.5	16 44 45.92	25 1.38	18 57 58.3	0 16 5.2	8.19656	+ 8	14 43.9
17.0	17 9 47.30	25 7.13	19 14 3.5	−0 3 21.6	8.19664	31	14 44.0
17.5	17 34 54.43	25 10.44	19 17 25.1	+0 9 29.5	8.19695	52	14 44.6
18.0	18 0 4.87	25 11.13	19 7 55.6	0 22 20.0	8.19747	73	14 45.7
18.5	18 25 16.00	25 9.23	18 45 35.6	0 35 1.5	8.19820	90	14 47.2
19.0	18 50 25.23	25 4.94	18 10 34.1	0 47 24.2	8.19910	107	14 49.0
19.5	19 15 30.17	24 58.75	17 23 9.9	+0 59 19.2	8.20017	+121	14 51.2
20.0	19 40 28.92	24 51.11	−16 23 50.7	1 10 38.8	8.20138	134	14 53.7
20.5	20 5 20.03	24 42.78	15 13 11.9	1 21 14.4	8.20272	147	14 56.5
21.0	20 30 2.81	24 34.51	13 51 57.5	1 30 59.8	8.20419	157	14 59.5
21.5	20 54 37.32	24 27.01	12 20 57.7	1 39 48.7	8.20576	166	15 2.8
22.0	21 19 4.33	24 21.09	10 41 9.0	1 47 36.3	8.20742	176	15 6.2
22.5	21 43 25.42	24 17.49	8 53 32.7	1 54 17.7	8.20918	185	15 9.9
23.0	22 7 42.91	24 16.88	6 59 15.0	1 59 49.0	8.21103	193	15 13.8
23.5	22 31 59.79	24 19.84	4 59 26.0	2 4 6.6	8.21296	201	15 17.9
24.0	22 56 19.63	24 26.91	2 55 19.4	2 7 6.6	8.21497	208	15 22.1
24.5	23 20 46.54	24 38.48	− 0 48 12.8	+2 8 45.3	8.21705	+216	15 26.6
25.0	23 45 25.02	24 54.89	+ 1 20 32.5	2 8 57.9	8.21921	222	15 31.2
25.5	0 10 19.91	25 16.23	3 29 30.4	2 7 39.6	8.22143	228	15 36.0
26.0	0 35 36.14	25 42.50	5 37 10.0	2 4 44.6	8.22371	231	15 40.9
26.5	1 1 18.64	26 13.44	7 41 54.6	2 0 7.5	8.22602	233	15 45.9
27.0	1 27 32.08	26 48.58	9 42 2.1	1 53 41.8	8.22835	233	15 51.0
27.5	1 54 20.66	27 27.02	11 35 43.9	1 45 22.0	8.23068	230	15 56.1
28.0	2 21 47.68	28 7.60	13 21 5.9	1 35 4.6	8.23298	222	16 1.2
28.5	2 49 55.28	28 48.73	14 56 10.5	1 22 47.9	8.23520	212	16 6.1
29.0	3 18 44.01	29 28.46	16 18 58.4	1 8 35.0	8.23732	197	16 10.8
29.5	3 48 12.47		17 27 33.4		8.23929		16 15.2

Juli 12 $1^h 40^m.2$ Erstes Viertel. Juli 20 $5^h 38^m.8$ Vollmond. Juli 27 $18^h 8^m.2$ Letztes Viertel.

Im Meridian von Berlin.

Datum und Culmination		Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Vergl.-Sterne Gr.
		h m	h m s	s	s	° '	'	h m	° '	
Juli 10	O	4 27.5	11 37 59	−64.49	127.79	− 0 50.3	−11.2	11 8.8	+ 0 28	5.5
	U	16 50.8	12 3 21	−64.03	125.97	− 3 2.5	−10.9	11 13.9	+ 2 11	6.5
11	O	5 13.8	12 28 24	−63.70	124.66	− 5 10.4	−10.4	12 1.0	− 2 35	6.4
	U	17 36.6	12 53 14	−63.49	123.82	− 7 12.7	− 9.9	12 13.2	− 3 24	6.8
12	O	5 59.3	13 17 57	−63.38	123.42	− 9 8.5	− 9.3	12 49.3	− 9 0	5.0
	U	18 22.0	13 42 38	−63.38	123.42	−10 56.6	− 8.7	13 3.5	− 8 28	5.9
13	O	6 44.7	14 7 20	−63.45	123.74	−12 36.2	− 7.9	13 27.8	− 9 40	5.5
	U	19 7.4	14 32 8	−63.60	124.32	−14 6.6	− 7.1	13 40.8	−11 56	6.0
14	O	7 30.3	14 57 5	−63.79	125.11	−15 26.8	− 6.2	14 13.9	−12 55	4.6
	U	19 53.4	15 22 12	−63.99	126.01	−16 36.1	− 5.3	14 40.6	−15 3	6.2
15	O	8 16.7	15 47 30	−64.21	126.97	−17 33.8	− 4.3	15 17.6	−14 47	6.3
	U	20 40.1	16 12 59	−64.43	127.91	−18 19.3	− 3.3	15 22.8	−16 22	6.2
16	O	9 3.8	16 38 40	−64.61	128.75	−18 52.1	− 2.2	16 13.4	−19 59	6.0
	U	21 27.6	17 4 29	−64.75	129.42	−19 11.7	− 1.1	16 18.4	−19 49	4.6
17	O	9 51.5	17 30 25	−64.84	129.90	−19 17.7	+ 0.1	16 59.0	−20 21	6.5
	U	22 15.4	17 56 25	−64.87	130.12	−19 10.1	+ 1.2	17 14.2	−17 39	6.0
18	O	10 39.4	18 22 27	−64.83	130.10	−18 48.8	+ 2.3	17 54.2	−20 20	6.5
	U	23 3.4	18 48 27	−64.75	129.83	−18 13.8	+ 3.5	18 9.4	−20 25	6.2
19	O	11 27.3	19 14 22	−64.61	129.36	−17 25.6	+ 4.6	18 37.2	−19 23	6.5
	U	23 51.0	19 40 10	−64.43	128.72	−16 24.6	+ 5.6	18 57.4	−19 23	5.9
20	O	12 14.6	20 5 50	+64.24	127.94	−15 11.6	+ 6.6	19 38.0	−15 42	5.5
—		—	—	—	—	—	—	19 52.5	−15 45	5.0
21	U	0 38.1	20 31 21	+64.04	127.16	−13 47.4	+ 7.5	20 28.8	−14 4	6.2
	O	13 1.5	20 56 43	+63.86	126.44	−12 12.8	+ 8.3	20 45.4	−12 54	6.3
22	U	1 24.7	21 21 56	+63.73	125.83	−10 28.9	+ 9.0	21 20.0	−10 10	5.7
	O	13 47.7	21 47 4	+63.63	125.41	− 8 36.8	+ 9.7	21 32.6	− 8 18	4.8
23	U	2 10.8	22 12 7	+63.62	125.26	− 6 37.9	+10.2	22 12.0	− 5 53	5.9
	O	14 33.8	22 37 11	+63.69	125.43	− 4 33.2	+10.6	22 19.1	− 5 20	5.8
24	U	2 56.9	23 2 19	+63.86	125.98	− 2 24.3	+10.9	22 53.3	− 2 55	6.3
	O	15 20.1	23 27 36	+64.14	126.96	− 0 12.5	+11.1	23 22.0	+ 0 43	5.0
25	U	3 43.6	23 53 7	+64.54	128.38	+ 2 0.6	+11.1	23 44.5	+ 0 32	6.1
	O	16 7.4	0 18 58	+65.06	130.28	+ 4 13.6	+11.0	23 48.1	+ 1 33	6.3
26	U	4 31.7	0 45 15	+65.68	132.66	+ 6 24.7	+10.8	0 43.6	+ 7 3	4.6
	O	16 56.4	1 12 2	+66.42	135.48	+ 8 32.0	+10.4	0 57.9	+ 7 22	4.5
27	U	5 21.8	1 39 27	+67.25	138.73	+10 33.7	+ 9.8	1 31.9	+11 38	5.6
	O	17 47.8	2 7 31	+68.14	142.30	+12 27.8	+ 9.1	1 45.7	+10 33	5.8
28	U	6 14.6	2 36 21	+69.08	146.09	+14 12.0	+ 8.2	2 39.2	+14 54	5.8
	O	18 42.2	3 5 56	+70.01	149.94	+15 44.1	+ 7.1	2 46.1	+14 41	5.5
29	U	7 10.4	3 36 17	+70.90	153.65	+17 1.8	+ 5.8	3 33.9	+16 13	6.4
	O	19 39.4	4 7 20	+71.67	157.00	+18 3.1	+ 4.4	3 47.6	+17 2	6.0

Juli 16 14^h Apogaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
Juli 29.0	3 18 44.01	29 28.46	+16 18 58.4	+1 8 35.0	8.23732	+197	16 10.8
29.5	3 48 12.47	30 4.62	17 27 33.4	0 52 33.9	8.23929	176	16 15.2
30.0	4 18 17.09	30 34.96	18 20 7.3	0 34 59.3	8.24105	150	16 19.2
30.5	4 48 52.05	30 57.34	18 55 6.6	+0 16 12.8	8.24255	120	16 22.6
31.0	5 19 49.39	31 10.17	19 11 19.4	−0 3 18.1	8.24375	85	16 25.3
31.5	5 50 59.56	31 12.42	19 8 1.3	0 23 0.4	8.24460	47	16 27.2
Aug. 1.0	6 22 11.98	31 4.04	18 45 0.9	0 42 19.3	8.24507	+ 5	16 28.3
1.5	6 53 16.02	30 45.68	18 2 41.6	1 0 40.1	8.24512	− 40	16 28.4
2.0	7 24 1.70	30 18.90	17 2 1.5	1 17 31.8	8.24472	85	16 27.5
2.5	7 54 20.60	29 45.62	15 44 29.7	−1 32 29.3	8.24387	−129	16 25.6
3.0	8 24 6.22	29 8.05	+14 12 0.4	1 45 14.7	8.24258	171	16 22.7
3.5	8 53 14.27	28 28.40	12 26 45.7	1 55 38.0	8.24087	210	16 18.8
4.0	9 21 42.67	27 48.57	10 31 7.7	2 3 35.3	8.23877	245	16 14.1
4.5	9 49 31.24	27 10.24	8 27 32.4	2 9 10.1	8.23632	273	16 8.6
5.0	10 16 41.48	26 34.64	6 18 22.3	2 12 28.7	8.23359	296	16 2.5
5.5	10 43 16.12	26 2.65	4 5 53.6	2 13 41.9	8.23063	312	15 56.0
6.0	11 9 18.77	25 34.86	+ 1 52 11.7	2 13 1.3	8.22751	322	15 49.1
6.5	11 34 53.63	25 11.59	− 0 20 49.6	2 10 39.0	8.22429	323	15 42.1
7.0	12 0 5.22	24 52.91	2 31 28.6	2 6 47.3	8.22106	320	15 35.1
7.5	12 24 58.13	24 38.69	4 38 15.9	−2 1 36.8	8.21786	−310	15 28.3
8.0	12 49 36.82	24 28.74	− 6 39 52.7	1 55 17.2	8.21476	295	15 21.7
8.5	13 14 5.56	24 22.77	8 35 9.9	1 47 57.4	8.21181	276	15 15.4
9.0	13 38 28.33	24 20.32	10 23 7.3	1 39 44.5	8.20905	251	15 9.6
9.5	14 2 48.65	24 20.89	12 2 51.8	1 30 43.7	8.20654	224	15 4.4
10.0	14 27 9.54	24 23.99	13 33 35.5	1 21 1.1	8.20430	194	14 59.7
10.5	14 51 33.53	24 29.00	14 54 36.6	1 10 40.5	8.20236	163	14 55.7
11.0	15 16 2.53	24 35.32	16 5 17.1	0 59 45.5	8.20073	130	14 52.4
11.5	15 40 37.85	24 42.35	17 5 2.6	0 48 20.6	8.19943	96	14 49.7
12.0	16 5 20.20	24 49.41	17 53 23.2	0 36 29.8	8.19847	63	14 47.7
12.5	16 30 9.61	24 56.00	18 29 53.0	−0 24 17.3	8.19784	− 30	14 46.5
13.0	16 55 5.61	25 1.59	−18 54 10.3	−0 11 48.1	8.19754	+ 2	14 45.9
13.5	17 20 7.20	25 5.78	19 5 58.4	+0 0 51.7	8.19756	32	14 45.9
14.0	17 45 12.98	25 8.27	19 5 6.7	0 13 36.2	8.19788	61	14 46.5
14.5	18 10 21.25	25 8.97	18 51 30.5	0 26 18.3	8.19849	87	14 47.8
15.0	18 35 30.22	25 7.87	18 25 12.2	0 38 50.4	8.19936	110	14 49.6
15.5	19 0 38.09	25 5.17	17 46 21.8	0 51 4.4	8.20046	132	14 51.8
16.0	19 25 43.26	25 1.16	16 55 17.4	1 2 52.6	8.20178	149	14 54.5
16.5	19 50 44.42	24 56.29	15 52 24.8	1 14 6.8	8.20327	165	14 57.6
17.0	20 15 40.71	24 51.08	14 38 18.0	1 24 38.6	8.20492	176	15 1.0
17.5	20 40 31.79		13 13 39.4		8.20668		15 4.7

Aug. 3 9ʰ 10.ᵐ8 Neumond. Aug. 10 17ʰ 17.ᵐ8 Erstes Viertel.

Im Meridian von Berlin.

Datum und Culmination			Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Gr.
			h m	h m s	s	s	° ′	′	h m	° ′	
Juli	29	U	7 10.4	3 36 17	+70.90	153.65	+17 1.8	+ 5.8	3 33.9	+16 13	6.4
		O	19 39.4	4 7 20	+71.67	157.00	+18 3.1	+ 4.4	3 47.6	+17 2	6.0
	30	U	8 9.1	4 39 1	+72.30	159.74	+18 45.9	+ 2.8	4 40.6	+18 33	6.5
		O	20 39.2	5 11 10	+72.73	161.68	+19 8.7	+ 1.0	4 45.7	+18 40	5.1
	31	U	9 9.6	5 43 36	+72.93	162.63	+19 10.8	— 0.7			
		O	21 40.0	6 16 8	+72.87	162.53	+18 51.0	— 2.5			
Aug.	1	U	10 10.4	6 48 33	+72.58	161.39	+18 10.4	— 4.3			
		O	22 40.5	7 20 39	+72.08	159.32	+17 9.6	— 5.9			
	2	U	11 10.0	7 52 15	+71.40	156.50	+15 50.4	— 7.3			
		O	23 38.9	8 23 15	+70.59	153.14	+14 14.9	— 8.6			
	3	U	12 7.2	8 53 32	—69.71	149.64	+12 25.7	— 9.6			
			—	—	—	—	—	—			
	4	O	0 34.7	9 23 4	—68.80	145.90	+10 25.3	—10.4			
		U	13 1.4	9 51 52	—67.90	142.24	+ 8 16.7	—11.0			
	5	O	1 27.5	10 19 58	—67.07	138.81	+ 6 2.4	—11.4			
		U	13 52.9	10 47 24	—66.31	135.71	+ 3 45.0	—11.5			
	6	O	2 17.7	11 14 15	—65.65	133.00	+ 1 26.7	—11.5			
		U	14 42.0	11 40 36	—65.10	130.72	— 0 50.5	—11.3			
	7	O	3 5.9	12 6 32	—64.65	128.88	— 3 4.6	—11.0			
		U	15 29.5	12 32 10	—64.32	127.47	— 5 14.2	—10.6			
	8	O	3 52.8	12 57 33	—64.09	126.48	— 7 17.9	—10.0	12 26.6	— 4 31	6.3
		U	16 16.0	13 22 46	—63.95	125.86	— 9 14.4	— 9.4	12 31.8	— 5 18	5.9
	9	O	4 39.1	13 47 55	—63.90	125.60	—11 2.8	— 8.7	13 20.1	—10 39	1.2
		U	17 2.2	14 13 2	—63.93	125.62	—12 42.1	— 7.9	13 27.8	— 9 40	5.5
	10	O	5 25.3	14 38 11	—64.00	125.89	—14 11.4	— 7.0	14 3.3	—11 22	6.5
		U	17 48.5	15 3 24	—64.13	126.34	—15 30.1	— 6.1	14 13.8	—12 55	4.6
	11	O	6 11.8	15 28 44	—64.28	126.92	—16 37.5	— 5.1	15 1.2	—15 53	5.4
		U	18 35.2	15 54 11	—64.44	127.57	—17 33.0	— 4.1	15 9.1	—17 24	6.5
	12	O	6 58.7	16 19 46	—64.59	128.22	—18 16.1	— 3.1	15 54.9	—16 15	5.6
		U	19 22.4	16 45 28	—64.73	128.83	—18 46.3	— 2.0	15 59.8	—19 32	3.0
	13	O	7 46.2	17 11 17	—64.83	129.34	—19 3.2	— 0.9	16 36.2	—19 44	5.7
		U	20 10.1	17 37 12	—64.90	129.70	—19 6.7	+ 0.3	16 56.2	—18 45	6.5
	14	O	8 34.0	18 3 10	—64.91	129.90	—18 56.7	+ 1.4	17 18.9	—18 21	6.3
		U	20 58.0	18 29 9	—64.88	129.94	—18 33.1	+ 2.5	17 50.2	—18 47	6.5
	15	O	9 21.9	18 55 7	—64.82	129.79	—17 56.0	+ 3.6	18 25.8	—18 28	5.2
		U	21 45.8	19 21 3	—64.71	129.51	—17 5.7	+ 4.7	18 37.2	—19 23	6.5
	16	O	10 9.6	19 46 55	—64.57	129.10	—16 2.8	+ 5.8	19 16.2	—18 29	6.1
		U	22 33.3	20 12 41	—64.42	128.63	—14 47.8	+ 6.7	19 35.2	—16 31	5.5
	17	O	10 57.0	20 38 22	—64.28	128.15	—13 21.5	+ 7.6	20 15.6	—15 5	3.4
		U	23 20.6	21 3 57	—64.15	127.72	—11 44.7	+ 8.5	20 25.6	—15 23	6.2

Aug. 1 7^h Perigaeum. Aug. 13 5^h Apogaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
Aug. 17.0	20 15 40.71	24 51.08	−14 38 18.0	+1 24 38.6	8.20492	+176	15 1.0
17.5	20 40 31.79	24 46.11	13 13 39.4	1 34 20.8	8.20668	186	15 4.7
18.0	21 5 17.90	24 42.03	11 39 18.6	1 43 5.8	8.20854	192	15 8.6
18.5	21 29 59.93	24 39.40	9 56 12.8	1 50 46.6	8.21046	196	15 12.6
19.0	21 54 39.33	24 38.85	8 5 26.2	1 57 16.9	8.21242	197	15 16.7
19.5	22 19 18.18	24 40.91	6 8 9.3	2 2 30.6	8.21439	198	15 20.9
20.0	22 43 59.09	24 46.04	4 5 38.7	2 6 22.0	8.21637	195	15 25.1
20.5	23 8 45.13	24 54.63	− 1 59 16.7	2 8 46.0	8.21832	191	15 29.3
21.0	23 33 39.76	25 6.97	+ 0 9 29.3	2 9 38.1	8.22023	186	15 33.4
21.5	23 58 46.73	25 23.19	2 19 7.4	+2 8 53.1	8.22209	+181	15 37.4
22.0	0 24 9.92	25 43.34	+ 4 28 0.5	2 6 27.4	8.22390	174	15 41.3
22.5	0 49 53.26	26 7.20	6 34 27.9	2 2 17.2	8.22564	168	15 45.1
23.0	1 16 0.46	26 34.40	8 36 45.1	1 56 19.8	8.22732	161	15 48.7
23.5	1 42 34.86	27 4.40	10 33 4.9	1 48 33.4	8.22893	153	15 52.2
24.0	2 9 39.26	27 36.22	12 21 38.3	1 38 56.8	8.23046	145	15 55.6
24.5	2 37 15.48	28 8.79	14 0 35.1	1 27 33.0	8.23191	137	15 58.8
25.0	3 5 24.27	28 40.67	15 28 8.1	1 14 25.6	8.23328	127	16 1.8
25.5	3 34 4.94	29 10.33	16 42 33.7	0 59 42.7	8.23455	116	16 4.6
26.0	4 3 15.27	29 36.11	17 42 16.4	0 43 36.3	8.23571	103	16 7.2
26.5	4 32 51.38	29 56.43	18 25 52.7	+0 26 23.1	8.23674	+ 88	16 9.5
27.0	5 2 47.81	30 9.97	+18 52 15.8	+0 8 22.9	8.23762	71	16 11.5
27.5	5 32 57.78	30 15.84	19 0 38.7	−0 9 59.9	8.23833	52	16 13.1
28.0	6 3 13.62	30 13.61	18 50 38.8	0 28 18.7	8.23885	30	16 14.3
28.5	6 33 27.23	30 3.57	18 22 20.1	0 46 7.4	8.23915	+ 5	16 14.9
29.0	7 3 30.80	29 46.39	17 36 12.7	1 2 59.6	8.23920	− 22	16 15.0
29.5	7 33 17.19	29 23.35	16 33 13.1	1 18 31.5	8.23898	49	16 14.5
30.0	8 2 40.54	28 55.92	15 14 41.6	1 32 24.6	8.23849	80	16 13.4
30.5	8 31 36.46	28 25.72	13 42 17.0	1 44 23.3	8.23769	111	16 11.7
31.0	9 0 2.18	27 54.31	11 57 53.7	1 54 18.6	8.23658	141	16 9.2
31.5	9 27 56.49	27 23.10	10 3 35.1	−2 2 4.1	8.23517	−170	16 6.0
Sept. 1.0	9 55 19.59	26 53.23	+ 8 1 31.0	2 7 40.1	8.23347	196	16 2.2
1.5	10 22 12.82	26 25.65	5 53 50.9	2 11 8.6	8.23151	221	15 57.9
2.0	10 48 38.47	26 0.99	3 42 42.3	2 12 35.5	8.22930	241	15 53.1
2.5	11 14 39.46	25 39.68	+ 1 30 6.8	2 12 8.3	8.22689	257	15 47.8
3.0	11 40 19.14	25 21.86	− 0 42 1.5	2 9 56.2	8.22432	268	15 42.2
3.5	12 5 41.00	25 7.60	2 51 57.7	2 6 7.9	8.22164	275	15 36.4
4.0	12 30 48.60	24 56.81	4 58 5.6	2 0 54.0	8.21889	275	15 30.5
4.5	12 55 45.41	24 49.22	6 58 59.6	1 54 24.2	8.21614	272	15 24.6
5.0	13 20 34.63	24 44.52	8 53 23.8	1 46 46.5	8.21342	261	15 18.8
5.5	13 45 19.15		10 40 10.3		8.21081		15 13.3

Aug. 18 18h 56.9m Vollmond. Aug. 25 23h 58.1m Letztes Viertel. Sept. 1 18h 13.0m Neumond.

Im Meridian von Berlin.

Datum und Culmination		Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Decl.	Gr.
		h m	h m s	s	s	° ′	′	h m	° ′	
Aug. 17	O	10 57.0	20 38 22	−64.28	128.15	−13 21.5	+ 7.6	20 15.6	−15 5	3.4
	U	23 20.6	21 3 57	−64.15	127.72	−11 44.7	+ 8.5	20 25.6	−15 23	6.2
18	O	11 44.1	21 29 27	−64.06	127.40	− 9 58.6	+ 9.2	21 4.3	−11 46	4.6
—		—	—	—	—	—	—	21 9.0	−11 1	6.5
19	U	0 7.5	21 54 55	+64.02	127.23	− 8 4.3	+ 9.8	21 58.2	− 7 0	5.6
	O	12 30.9	22 20 22	+64.04	127.30	− 6 3.0	+10.4	22 4.4	− 8 1	6.5
20	U	0 54.3	22 45 51	+64.14	127.65	− 3 56.2	+10.8	22 32.7	− 4 44	5.5
	O	13 17.9	23 11 26	+64.32	128.32	− 1 45.4	+11.0	22 53.3	− 2 55	6.3
21	U	1 41.6	23 37 12	+64.61	129.33	+ 0 27.8	+11.2	23 37.1	+ 1 14	4.7
	O	14 5.5	0 3 11	+64.99	130.71	+ 2 41.7	+11.1	23 41.4	+ 2 57	5.2
22	U	2 29.8	0 29 29	+65.46	132.46	+ 4 54.6	+11.0	0 27.4	+ 6 25	5.7
	O	14 54.5	0 56 11	+66.03	134.59	+ 7 4.5	+10.7	0 43.3	+ 6 46	6.0
23	U	3 19.6	1 23 20	+66.68	137.05	+ 9 9.7	+10.2	1 16.2	+11 1	6.5
	O	15 45.2	1 51 0	+67.40	139.79	+11 8.0	+ 9.5	1 32.0	+11 38	5.6
24	U	4 11.4	2 19 14	+68.15	142.74	+12 57.4	+ 8.7	2 27.6	+14 36	6.5
	O	16 38.2	2 48 4	+68.92	145.78	+14 35.9	+ 7.7	2 39.2	+14 54	5.8
25	U	5 5.6	3 17 31	+69.68	148.78	+16 1.4	+ 6.5	3 21.5	+18 25	6.5
	O	17 33.5	3 47 32	+70.36	151.57	+17 12.1	+ 5.2	3 25.8	+17 36	6.5
26	U	6 2.0	4 18 5	+70.95	153.99	+18 6.3	+ 3.8	4 17.3	+17 19	4.0
	O	18 31.0	4 49 5	+71.39	155.88	+18 42.4	+ 2.2	4 22.9	+18 58	3.7
27	U	7 0.2	5 20 23	+71.68	157.09	+18 59.4	+ 0.6	5 21.5	+17 53	5.4
	O	19 29.6	5 51 52	+71.77	157.55	+18 56.6	− 1.1	5 26.5	+18 31	4.6
28	U	7 59.1	6 23 21	+71.66	157.22	+18 33.8	− 2.7	6 26.6	+17 51	6.5
	O	20 28.4	6 54 42	+71.38	156.12	+17 51.6	− 4.3	6 36.7	+17 44	5.1
29	U	8 57.4	7 25 46	+70.93	154.35	+16 50.7	− 5.8			
	O	21 26.0	7 56 26	+70.34	152.05	+15 32.7	− 7.2			
30	U	9 54.1	8 26 35	+69.67	149.37	+13 59.4	− 8.4			
	O	22 21.7	8 56 11	+68.93	146.49	+12 12.8	− 9.4			
31	U	10 48.7	9 25 12	+68.19	143.54	+10 15.3	−10.2			
	O	23 15.1	9 53 38	+67.47	140.67	+ 8 9.3	−10.8			
Sept. 1	U	11 40.9	10 21 30	+66.79	137.99	+ 5 57.3	−11.2			
—		—	—	—	—	—	—			
2	O	0 6.3	10 48 52	−66.17	135.65	+ 3 41.5	−11.4			
	U	12 31.1	11 15 46	−65.63	133.53	+ 1 24.4	−11.4			
3	O	0 55.5	11 42 17	−65.20	131.73	− 0 52.1	−11.3			
	U	13 19.7	12 8 29	−64.84	130.28	− 3 6.1	−11.0			
4	O	1 43.6	12 34 25	−64.58	129.16	− 5 15.8	−10.6			
	U	14 7.3	13 0 9	−64.40	128.36	− 7 19.7	−10.1			
5	O	2 30.9	13 25 46	−64.29	127.85	− 9 16.4	− 9.4			
	U	14 54.4	13 51 18	−64.26	127.58	−11 4.8	− 8.6			

Aug. 28 20h Perigaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
Sept. 5.0	13 20 34.63	24 44.52	− 8 53 23.8	−1 46 46.5	8.21342	−261	15 18.8
5.5	13 45 19.15	24 42.35	10 40 10.3	1 38 10.6	8.21081	246	15 13.3
6.0	14 10 1.50	24 42.26	12 18 20.9	1 28 43.6	8.20835	228	15 8.2
6.5	14 34 43.76	24 43.77	13 47 4.5	1 18 33.0	8.20607	205	15 3.4
7.0	14 59 27.53	24 46.42	15 5 37.5	1 7 44.9	8.20402	179	14 59.2
7.5	15 24 13.95	24 49.74	16 13 22.4	0 56 25.5	8.20223	149	14 55.5
8.0	15 49 3.69	24 53.22	17 9 47.9	0 44 40.7	8.20074	119	14 52.4
8.5	16 13 56.91	24 56.51	17 54 28.6	0 32 35.6	8.19955	85	14 50.0
9.0	16 38 53.42	24 59.23	18 27 4.2	0 20 15.7	8.19870	51	14 48.2
9.5	17 3 52.65		18 47 19.9		8.19819		14 47.2
		25 1.09		−0 7 46.2		− 16	
10.0	17 28 53.74	25 1.96	−18 55 6.1	+0 4 47.4	8.19803	+ 19	14 46.9
10.5	17 53 55.70	25 1.75	18 50 18.7	0 17 19.9	8.19822	53	14 47.2
11.0	18 18 57.45	25 0.53	18 32 58.8	0 29 45.5	8.19875	85	14 48.3
11.5	18 43 57.98	24 58.42	18 3 13.3	0 41 58.5	8.19960	117	14 50.1
12.0	19 8 56.40	24 55.72	17 21 14.8	0 53 53.0	8.20077	145	14 52.5
12.5	19 33 52.12	24 52.77	16 27 21.8	1 5 22.2	8.20222	171	14 55.5
13.0	19 58 44.89	24 49.94	15 21 59.6	1 16 20.0	8.20393	194	14 59.0
13.5	20 23 34.83	24 47.70	14 5 39.6	1 26 39.8	8.20587	212	15 3.0
14.0	20 48 22.53	24 46.55	12 38 59.8	1 36 13.7	8.20799	227	15 7.4
14.5	21 13 9.08		11 2 46.1		8.21026		15 12.2
		24 46.95		+1 44 54.8		+238	
15.0	21 37 56.03	24 49.32	− 9 17 51.3	1 52 35.2	8.21264	244	15 17.2
15.5	22 2 45.35	24 54.16	7 25 16.1	1 59 6.9	8.21508	246	15 22.4
16.0	22 27 39.51	25 1.78	5 26 9.2	2 4 20.9	8.21754	243	15 27.6
16.5	22 52 41.29	25 12.51	3 21 48.3	2 8 9.8	8.21997	236	15 32.8
17.0	23 17 53.80	25 26.48	− 1 13 38.5	2 10 25.1	8.22233	226	15 37.9
17.5	23 43 20.28	25 43.83	+ 0 56 46.6	2 10 58.6	8.22459	211	15 42.8
18.0	0 9 4.11	26 4.45	3 7 45.2	2 9 44.0	8.22670	195	15 47.4
18.5	0 35 8.56	26 28.11	5 17 29.2	2 6 35.4	8.22865	176	15 51.6
19.0	1 1 36.67	26 54.35	7 24 4.6	2 1 28.6	8.23041	154	15 55.5
19.5	1 28 31.02		9 25 33.2		8.23195		15 58.9
		27 22.51		+1 54 21.5		+133	
20.0	1 55 53.53	27 51.61	+11 19 54.7	1 45 14.7	8.23328	110	16 1.8
20.5	2 23 45.14	28 20.62	13 5 9.4	1 34 12.3	8.23438	89	16 4.3
21.0	2 52 5.76	28 48.15	14 39 21.7	1 21 21.1	8.23527	68	16 6.3
21.5	3 20 53.91	29 12.82	16 0 42.8	1 6 52.6	8.23595	48	16 7.8
22.0	3 50 6.73	29 33.16	17 7 35.4	0 51 1.7	8.23643	29	16 8.8
22.5	4 19 39.89	29 47.96	17 58 37.1	0 34 6.9	8.23672	+ 11	16 9.5
23.0	4 49 27.85	29 56.16	18 32 44.0	+0 16 30.3	8.23683	− 5	16 9.7
23.5	5 19 24.01	29 57.22	18 49 14.3	−0 1 25.2	8.23678	21	16 9.6
24.0	5 49 21.23	29 51.08	18 47 49.1	0 19 14.9	8.23657	35	16 9.2
24.5	6 19 12.31		18 28 34.2		8.23622		16 8.4

Sept. 9 11ʰ 8ᵐ.5 Erstes Viertel. Sept. 17 7ʰ 17ᵐ.0 Vollmond.

Im Meridian von Berlin.

Datum und Culmination		Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Gr.
		h m	h m s	s	s	° ′	′	h m	° ′	
Sept. 5	O	2 30.9	13 25 46	−64.29	127.85	− 9 16.4	− 9.4			
	U	14 54.4	13 51 18	−64.26	127.58	−11 4.8	− 8.6			
6	O	3 17.9	14 16 49	−64.28	127.53	−12 43.7	− 7.8			
	U	15 41.4	14 42 20	−64.33	127.64	−14 12.3	− 6.9			
7	O	4 4.9	15 7 53	−64.43	127.87	−15 29.9	− 6.0	14 40.6	−15 3	6.2
	U	16 28.5	15 33 29	−64.53	128.17	−16 35.8	− 5.0	14 45.5	−15 38	3.0
8	O	4 52.1	15 59 9	−64.63	128.49	−17 29.4	− 4.0	15 33.3	−18 59	5.7
	U	17 15.8	16 24 53	−64.72	128.80	−18 10.3	− 2.9	15 44.3	−17 36	6.5
9	O	5 39.5	16 50 40	−64.80	129.06	−18 38.2	− 1.8	16 21.4	−18 14	5.0
	U	18 3.3	17 16 30	−64.84	129.23	−18 52.8	− 0.7	16 34.8	−20 13	6.5
10	O	6 27.1	17 42 21	−64.85	129.31	−18 54.1	+ 0.5	17 14.2	−17 39	6.0
	U	18 50.9	18 8 13	−64.83	129.29	−18 42.0	+ 1.6	17 18.9	−18 21	6.3
11	O	7 14.7	18 34 4	−64.78	129.17	−18 16.5	+ 2.7	18 9.4	−20 25	6.2
	U	19 38.5	18 59 53	−64.71	128.97	−17 37.9	+ 3.8	18 15.7	−18 54	var.
12	O	8 2.3	19 25 39	−64.61	128.71	−16 46.5	+ 4.8	18 57.4	−19 23	5.9
	U	20 26.0	19 51 21	−64.51	128.44	−15 42.6	+ 5.8	19 1.5	−18 53	6.5
13	O	8 49.6	20 17 1	−64.41	128.19	−14 26.9	+ 6.8	19 38.0	−15 42	5.5
	U	21 13.1	20 42 38	−64.32	128.00	−13 0.0	+ 7.7	19 52.5	−15 45	5.0
14	O	9 36.7	21 8 13	−64.27	127.92	−11 22.7	+ 8.5	20 28.8	−14 4	6.2
	U	22 0.2	21 33 49	−64.27	128.01	− 9 35.9	+ 9.3	20 45.4	−12 54	6.3
15	O	10 23.8	21 59 26	−64.31	128.29	− 7 40.7	+ 9.9	21 32.6	− 8 18	4.8
	U	22 47.5	22 25 9	−64.44	128.83	− 5 38.4	+10.5	21 39.8	− 9 32	5.2
16	O	11 11.3	22 50 59	−64.63	129.64	− 3 30.3	+10.9	22 19.1	− 5 20	5.8
	U	23 35.3	23 17 2	−64.91	130.75	− 1 18.1	+11.2	22 32.7	− 4 44	5.5
17	O	11 59.6	23 43 19	+65.28	132.25	+ 0 56.7	+11.3	23 22.0	+ 0 43	5.0
—		—	—	—	—	—	—	23 31.5	+ 1 34	5.6
18	U	0 24.2	0 9 56	+65.73	134.03	+ 3 12.1	+11.3	0 20.4	+ 1 24	5.8
	O	12 49.1	0 36 56	+66.27	136.10	+ 5 26.3	+11.1	0 27.4	+ 6 25	5.7
19	U	1 14.5	1 4 22	+66.87	138.45	+ 7 36.9	+10.7	1 3.3	+ 9 23	6.5
	O	13 40.4	1 32 16	+67.54	141.02	+ 9 42.0	+10.1	1 8.7	+ 7 3	4.2
20	U	2 6.8	2 0 46	+68.23	143.71	+11 39.2	+ 9.4	1 45.7	+10 33	5.8
	O	14 33.8	2 29 46	+68.93	146.43	+13 26.3	+ 8.5	1 54.2	+11 49	6.2
21	U	3 1.2	2 59 18	+69.60	149.06	+15 1.1	+ 7.4	2 46.1	+14 41	5.5
	O	15 29.2	3 29 21	+70.21	151.44	+16 21.7	+ 6.1	2 59.3	+15 29	6.5
22	U	3 57.7	3 59 50	+70.72	153.43	+17 26.3	+ 4.7	3 55.2	+17 55	5.7
	O	16 26.5	4 30 40	+71.10	154.90	+18 13.3	+ 3.2	4 3.5	+19 21	5.8
23	U	4 55.5	5 1 44	+71.32	155.73	+18 41.7	+ 1.6	5 3.1	+19 44	6.5
	O	17 24.6	5 32 55	+71.36	155.86	+18 50.8	0.0	5 13.5	+20 2	6.5
24	U	5 53.7	6 4 2	+71.24	155.28	+18 40.6	− 1.7	5 58.2	+20 8	4.8
	O	18 22.6	6 34 59	+70.94	154.05	+18 11.2	− 3.3	6 6.3	+19 49	5.6

Sept. 9 23h Apogaeum. Sept. 23 2h Perigaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
Sept. 24.0	5h 49m 21s.23	29m 51s.08	+18° 47′ 49″.1	−0° 19′ 14″.9	8.23657	−35	16′ 9″.2
24.5	6 19 12.31	29 38.13	18 28 34.2	0 36 35.5	8.23622	49	16 8.4
25.0	6 48 50.44	29 19.31	17 51 58.7	0 53 5.0	8.23573	63	16 7.3
25.5	7 18 9.75	28 55.75	16 58 53.7	1 8 24.5	8.23510	77	16 5.9
26.0	7 47 5.50	28 28.91	15 50 29.2	1 22 18.8	8.23433	90	16 4.2
26.5	8 15 34.41	28 0.20	14 28 10.4	1 34 35.5	8.23343	104	16 2.2
27.0	8 43 34.61	27 31.03	12 53 34.9	1 45 7.0	8.23239	118	15 59.9
27.5	9 11 5.64	27 2.56	11 8 27.9	1 53 47.6	8.23121	133	15 57.3
28.0	9 38 8.20	26 35.82	9 14 40.3	2 0 35.3	8.22988	148	15 54.3
28.5	10 4 44.02	26 11.54	7 14 5.0	−2 5 29.3	8.22840	−162	15 51.1
29.0	10 30 55.56	25 50.22	+ 5 8 35.7	2 8 31.7	8.22678	176	15 47.5
29.5	10 56 45.78	25 32.22	3 0 4.0	2 9 46.2	8.22502	189	15 43.7
30.0	11 22 18.00	25 17.62	+ 0 50 17.8	2 9 16.2	8.22313	200	15 39.6
30.5	11 47 35.62	25 6.43	− 1 18 58.4	2 7 7.8	8.22113	210	15 35.3
Oct. 1.0	12 12 42.05	24 58.38	3 26 6.2	2 3 26.8	8.21903	216	15 30.8
1.5	12 37 40.43	24 53.28	5 29 33.0	1 58 20.0	8.21687	221	15 26.2
2.0	13 2 33.71	24 50.70	7 27 53.0	1 51 53.8	8.21466	222	15 21.5
2.5	13 27 24.41	24 50.23	9 19 46.8	1 44 16.6	8.21244	219	15 16.8
3.0	13 52 14.64	24 51.30	11 4 3.4	1 35 35.9	8.21025	212	15 12.2
3.5	14 17 5.94	24 53.54	12 39 39.3	−1 25 59.3	8.20813	−202	15 7.7
4.0	14 41 59.48	24 56.29	−14 5 38.6	1 15 35.0	8.20611	189	15 3.5
4.5	15 6 55.77	24 59.04	15 21 13.6	1 4 31.1	8.20422	170	14 59.6
5.0	15 31 54.81	25 1.53	16 25 44.7	0 52 54.7	8.20252	150	14 56.1
5.5	15 56 56.34	25 3.22	17 18 39.4	0 40 54.6	8.20102	126	14 53.0
6.0	16 21 59.56	25 3.76	17 59 34.0	0 28 36.8	8.19976	99	14 50.4
6.5	16 47 3.32	25 3.08	18 28 10.8	0 16 9.6	8.19877	68	14 48.4
7.0	17 12 6.40	25 1.13	18 44 20.4	−0 3 38.7	8.19809	36	14 47.0
7.5	17 37 7.53	24 57.94	18 47 59.1	+0 8 49.3	8.19773	− 4	14 46.2
8.0	18 2 5.47	24 53.75	18 39 9.8	0 21 8.9	8.19769	+ 30	14 46.2
8.5	18 26 59.22	24 48.84	18 18 0.9	+0 33 15.1	8.19799	+ 66	14 46.8
9.0	18 51 48.06	24 43.56	−17 44 45.8	0 45 3.1	8.19865	100	14 48.1
9.5	19 16 31.62	24 38.38	16 59 42.7	0 56 28.0	8.19965	134	14 50.2
10.0	19 41 10.00	24 33.80	16 3 14.7	1 7 26.0	8.20099	168	14 52.9
10.5	20 5 43.80	24 30.36	14 55 48.7	1 17 52.6	8.20267	198	14 56.4
11.0	20 30 14.16	24 28.54	13 37 56.1	1 27 43.4	8.20465	226	15 0.5
11.5	20 54 42.70	24 28.89	12 10 12.7	1 36 52.5	8.20691	250	15 5.2
12.0	21 19 11.59	24 31.84	10 33 20.2	1 45 14.9	8.20941	272	15 10.4
12.5	21 43 43.43	24 37.82	8 48 5.3	1 52 43.4	8.21213	288	15 16.1
13.0	22 8 21.25	24 47.22	6 55 21.9	1 59 9.9	8.21501	298	15 22.2
13.5	22 33 8.47		4 56 12.0		8.21799		15 28.6

Sept. 24 5h 25m.1 Letztes Viertel. Oct. 1 6h 2m.7 Neumond. Oct. 9 6h 14m.7 Erstes Viertel.

Im Meridian von Berlin.

Datum und Culmination		Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Vergl.-Sterne Gr.
		h m	h m s	s	s	° '	'	h m	° '	
Sept. 24	U	5 53.7	6 4 2	+71.24	155.28	+18 40.6	— 1.7	5 58.2	+20 8	4.8
	O	18 22.6	6 34 59	+70.94	154.05	+18 11.2	— 3.3	6 6.3	+19 49	5.6
25	U	6 51.2	7 5 38	+70.50	152.23	+17 23.6	— 4.7	7 7.8	+16 20	5.4
	O	19 19.4	7 35 52	+69.94	149.98	+16 18.9	— 6.1	7 12.5	+16 43	3.6
26	U	7 47.1	8 5 37	+69.29	147.43	+14 58.6	— 7.3	8 5.5	+14 55	6.3
	O	20 14.3	8 34 51	+68.60	144.72	+13 24.5	— 8.4	8 12.7	+15 59	6.5
27	U	8 40.9	9 3 32	+67.89	142.01	+11 38.5	— 9.3			
	O	21 7.0	9 31 41	+67.21	139.39	+ 9 42.7	—10.0			
28	U	9 32.6	9 59 19	+66.56	136.97	+ 7 39.2	—10.6			
	O	21 57.8	10 26 30	+65.99	134.81	+ 5 30.2	—10.9			
29	U	10 22.5	10 53 17	+65.49	132.94	+ 3 17.6	—11.1			
	O	22 46.9	11 19 43	+65.08	131.40	+ 1 3.5	—11.2			
30	U	11 11.0	11 45 53	+64.75	130.20	— 1 10.2	—11.1			
	O	23 34.9	12 11 50	+64.51	129.30	— 3 21.7	—10.8			
Oct. 1	U	11 58.7	12 37 38	—64.36	128.72	— 5 29.3	—10.4			
	—	—	—	—	—	—	—			
2	O	0 22.4	13 3 20	—64.27	128.38	— 7 31.5	— 9.9			
	U	12 46.0	13 29 0	—64.25	128.25	— 9 26.7	— 9.3			
3	O	1 9.6	13 54 39	—64.29	128.29	—11 13.7	— 8.5			
	U	13 33.2	14 20 19	—64.35	128.46	—12 51.4	— 7.7			
4	O	1 56.9	14 46 2	—64.44	128.70	—14 18.7	— 6.8			
	U	14 20.6	15 11 48	—64.54	128.96	—15 34.7	— 5.9			
5	O	2 44.4	15 37 38	—64.64	129.21	—16 38.8	— 4.8			
	U	15 8.3	16 3 29	—64.73	129.39	—17 30.5	— 3.8			
6	O	3 32.1	16 29 23	—64.78	129.47	—18 9.3	— 2.7			
	U	15 56.0	16 55 16	—64.80	129.43	—18 34.9	— 1.6			
7	O	4 19.8	17 21 8	—64.78	129.27	—18 47.1	— 0.5	16 59.0	—20 21	6.5
	U	16 43.6	17 46 58	—64.74	128.99	—18 46.0	+ 0.6	17 14.2	—17 39	6.0
8	O	5 7.3	18 12 44	—64.65	128.61	—18 31.6	+ 1.7	17 50.2	—18 47	6.5
	U	17 30.9	18 38 24	—64.55	128.16	—18 4.2	+ 2.8	17 54.2	—20 20	6.5
9	O	5 54.5	19 3 59	—64.42	127.67	—17 24.0	+ 3.9	18 25.7	—18 28	5.2
	U	18 18.0	19 29 28	—64.29	127.20	—16 31.5	+ 4.9	18 37.2	—19 23	6.5
10	O	6 41.3	19 54 52	—64.18	126.78	—15 27.0	+ 5.9	19 16.2	—18 29	6.1
	U	19 4.6	20 20 11	—64.08	126.47	—14 11.1	+ 6.8	19 35.2	—16 31	5.5
11	O	7 27.8	20 45 27	—64.01	126.31	—12 44.5	+ 7.7	20 15.6	—15 5	3.4
	U	19 51.0	21 10 44	—64.00	126.37	—11 7.8	+ 8.5	20 25.6	—15 23	6.2
12	O	8 14.3	21 36 2	—64.05	126.68	— 9 21.9	+ 9.2	21 9.0	—11 1	6.5
	U	20 37.7	22 1 25	—64.19	127.28	— 7 27.7	+ 9.8	21 17.7	— 9 44	6.4
13	O	9 1.2	22 26 58	—64.39	128.22	— 5 26.3	+10.4	21 58.2	— 7 0	5.6
	U	21 24.9	22 52 44	—64.70	129.51	— 3 18.9	+10.8	22 4.4	— 8 1	6.5

Oct. 7 19h Apogaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
Oct. 13.0	22 8 21.25	24 47.22	− 6 55 21.9	+1 59 9.9	8.21501	+298	15 22.2
13.5	22 33 8.47	25 0.31	4 56 12.0	2 4 26.4	8.21799	304	15 28.6
14.0	22 58 8.78	25 17.28	2 51 45.6	2 8 22.3	8.22103	303	15 35.1
14.5	23 23 26.06	25 38.22	− 0 43 23.3	2 10 47.6	8.22406	296	15 41.6
15.0	23 49 4.28	26 3.03	+ 1 27 24.3	2 11 30.7	8.22702	284	15 48.1
15.5	0 15 7.31	26 31.42	3 38 55.0	2 10 21.1	8.22986	264	15 54.3
16.0	0 41 38.73	27 2.91	5 49 16.1	2 7 8.8	8.23250	240	16 0.1
16.5	1 8 41.64	27 36.69	7 56 24.9	2 1 45.8	8.23490	210	16 5.4
17.0	1 36 18.33	28 11.70	9 58 10.7	1 54 7.2	8.23700	178	16 10.1
17.5	2 4 30.03	28 46.53	11 52 17.9	+1 44 12.4	8.23878	+141	16 14.1
18.0	2 33 16.56	29 19.62	+13 36 30.3	1 32 5.4	8.24019	104	16 17.3
18.5	3 2 36.18	29 49.05	15 8 35.7	1 17 56.8	8.24123	65	16 19.6
19.0	3 32 25.23	30 13.13	16 26 32.5	1 2 2.4	8.24188	+ 27	16 21.1
19.5	4 2 38.36	30 30.08	17 28 34.9	0 44 44.9	8.24215	− 9	16 21.7
20.0	4 33 8.44	30 38.70	18 13 19.8	0 26 30.9	8.24206	44	16 21.5
20.5	5 3 47.14	30 38.34	18 39 50.7	+0 7 50.1	8.24162	73	16 20.5
21.0	5 34 25.48	30 28.94	18 47 40.8	−0 10 47.3	8.24089	101	16 18.8
21.5	6 4 54.42	30 11.17	18 36 53.5	0 28 53.0	8.23988	123	16 16.6
22.0	6 35 5.59	29 46.32	18 8 0.5	0 46 1.1	8.23865	142	16 13.8
22.5	7 4 51.91	29 15.97	17 21 59.4	−1 1 51.5	8.23723	−158	16 10.6
23.0	7 34 7.88	28 42.08	+16 20 7.9	1 16 9.3	8.23565	170	16 7.1
23.5	8 2 49.96	28 6.45	15 3 58.6	1 28 44.6	8.23395	178	16 3.3
24.0	8 30 56.41	27 30.80	13 35 14.0	1 39 31.5	8.23217	185	15 59.4
24.5	8 58 27.21	26 56.57	11 55 42.5	1 48 28.9	8.23032	188	15 55.3
25.0	9 25 23.78	26 24.91	10 7 13.6	1 55 37.5	8.22844	191	15 51.2
25.5	9 51 48.69	25 56.65	8 11 36.1	2 0 59.8	8.22653	192	15 47.0
26.0	10 17 45.34	25 32.34	6 10 36.3	2 4 39.3	8.22461	193	15 42.8
26.5	10 43 17.68	25 12.29	4 5 57.0	2 6 40.3	8.22268	193	15 38.6
27.0	11 8 29.97	24 56.57	+ 1 59 16.7	2 7 6.4	8.22075	192	15 34.5
27.5	11 33 26.54	24 45.11	− 0 7 49.7	−2 6 2.0	8.21883	−191	15 30.4
28.0	11 58 11.65	24 37.63	− 2 13 51.7	2 3 31.0	8.21692	189	15 26.3
28.5	12 22 49.28	24 33.81	4 17 22.7	1 59 37.2	8.21503	188	15 22.3
29.0	12 47 23.09	24 33.15	6 16 59.9	1 54 25.2	8.21315	186	15 18.3
29.5	13 11 56.24	24 35.12	8 11 25.1	1 47 59.3	8.21129	183	15 14.3
30.0	13 36 31.36	24 39.12	9 59 24.4	1 40 24.2	8.20946	178	15 10.5
30.5	14 1 10.48	24 44.42	11 39 48.6	1 31 45.6	8.20768	172	15 6.8
31.0	14 25 54.90	24 50.39	13 11 34.2	1 22 9.9	8.20596	165	15 3.2
31.5	14 50 45.29	24 56.33	14 33 44.1	1 11 44.2	8.20431	155	14 59.8
Nov. 1.0	15 15 41.62	25 1.57	15 45 28.3	1 0 36.0	8.20276	142	14 56.6
1.5	15 40 43.19		16 46 4.3		8.20134		14 53.6

Oct. 16 18ʰ 54ᵐ.7 Vollmond. Oct. 23 11ʰ 51ᵐ.7 Letztes Viertel. Oct. 30 21ʰ 7ᵐ.2 Neumond.

Im Meridian von Berlin.

Datum und Culmination	Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1^h Länge	Decl.	Bew. in 1^h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Vergl.-Sterne Gr.
	h m	h m s	s	s	° ′	′	h m	° ′	
Oct. 13 O	9 1.2	22 26 58	−64.39	128.22	− 5 26.3	+10.4	21 58.2	− 7 0	5.6
U	21 24.9	22 52 44	−64.70	129.51	− 3 18.9	+10.8	22 4.4	− 8 1	6.5
14 O	9 49.0	23 18 49	−65.10	131.18	− 1 7.0	+11.1	22 32.7	− 4 44	5.5
U	22 13.4	23 45 15	−65.60	133.22	+ 1 7.9	+11.3	22 53.3	− 2 55	6.3
15 O	10 38.2	0 12 8	−66.19	135.64	+ 3 24.0	+11.3	23 41.4	+ 2 57	5.2
U	23 3.6	0 39 33	−66.88	138.40	+ 5 39.2	+11.2	23 48.1	+ 1 33	6.3
16 O	11 29.5	1 7 32	−67.62	141.41	+ 7 51.1	+10.8	0 43.7	+ 7 3	4.6
U	23 56.1	1 36 9	+68.41	144.77	+ 9 57.5	+10.2	0 57.9	+ 7 22	4.5
17 O	12 23.3	2 5 25	+69.23	148.06	+11 55.8	+ 9.5	1 32.0	+11 38	5.6
—	—	—	—	—	—	—	1 45.7	+10 33	5.8
18 U	0 51.2	2 35 21	+70.02	151.27	+13 43.5	+ 8.5	2 27.6	+14 36	6.5
O	13 19.7	3 5 53	+70.74	154.19	+15 18.0	+ 7.3	2 39.2	+14 54	5.8
19 U	1 48.7	3 36 58	+71.35	156.65	+16 37.0	+ 5.9	3 34.0	+16 13	6.4
O	14 18.2	4 8 29	+71.82	158.47	+17 38.6	+ 4.3	3 47.6	+17 2	6.0
20 U	2 47.9	4 40 17	+72.10	159.50	+18 21.2	+ 2.7	4 40.6	+18 33	6.5
O	15 17.8	5 12 13	+72.17	159.66	+18 43.9	+ 1.0	4 45.7	+18 40	5.1
21 U	3 47.6	5 44 5	+72.04	158.92	+18 46.3	− 0.7	5 49.2	+19 44	5.9
O	16 17.2	6 15 44	+71.69	157.35	+18 28.6	− 2.3	5 57.7	+19 42	5.1
22 U	4 46.4	6 46 59	+71.17	155.06	+17 51.7	− 3.8	6 41.7	+18 18	6.5
O	17 15.1	7 17 44	+70.51	152.23	+16 56.8	− 5.3	6 56.8	+17 54	6.2
23 U	5 43.2	7 47 53	+69.76	149.05	+15 45.5	− 6.6	7 33.9	+17 54	5.2
O	18 10.7	8 17 23	+68.94	145.72	+14 19.7	− 7.7	7 51.5	+16 3	5.9
24 U	6 37.5	8 46 12	+68.11	142.39	+12 41.5	− 8.6	8 41.6	+12 28	5.8
O	19 3.6	9 14 22	+67.30	139.21	+10 52.9	− 9.4	8 50.6	+12 0	5.7
25 U	7 29.1	9 41 56	+66.55	136.31	+ 8 55.8	−10.0	9 36.0	+10 20	3.8
O	19 54.1	10 8 57	+65.88	133.75	+ 6 52.4	−10.5	9 51.3	+ 9 24	6.0
26 U	8 18.6	10 35 29	+65.28	131.58	+ 4 44.6	−10.8	10 38.3	+ 5 16	6.1
O	20 42.7	11 1 37	+64.80	129.82	+ 2 34.1	−10.9	10 55.5	+ 4 9	5.0
27 U	9 6.5	11 27 27	+64.42	128.48	+ 0 22.8	−10.9			
O	21 30.0	11 53 3	+64.14	127.53	− 1 47.8	−10.8			
28 U	9 53.4	12 18 30	+63.96	126.97	− 3 55.9	−10.5			
O	22 16.8	12 43 52	+63.86	126.73	− 6 0.1	−10.1			
29 U	10 40.1	13 9 13	+63.86	126.78	− 7 59.0	− 9.6			
O	23 3.4	13 34 35	+63.91	127.04	− 9 51.2	− 9.0			
30 U	11 26.8	14 0 2	+64.01	127.48	−11 35.4	− 8.3			
O	23 50.4	14 25 35	−64.15	127.99	−13 10.4	− 7.5			
31 U	12 14.0	14 51 14	−64.30	128.54	−14 35.2	− 6.6			
—	—	—	—	—	—	—			
Nov. 1 O	0 37.7	15 17 0	−64.45	129.07	−15 48.9	− 5.6			
U	13 1.5	15 42 52	−64.57	129.49	−16 50.7	− 4.6			

Oct. 19 15^h Perigaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
Nov. 1.0	15 15 41.62	25 1.57	−15 45 28.3	−1 0 36.0	8.20276	−142	14 56.6
1.5	15 40 43.19	25 5.58	16 46 4.3	0 48 53.3	8.20134	129	14 53.6
2.0	16 5 48.77	25 7.85	17 34 57.6	0 36 45.1	8.20005	112	14 51.0
2.5	16 30 56.62	25 8.10	18 11 42.7	0 24 20.3	8.19893	93	14 48.7
3.0	16 56 4.72	25 6.15	18 36 3.0	−0 11 47.2	8.19800	71	14 46.8
3.5	17 21 10.87	25 2.06	18 47 50.2	+0 0 45.4	8.19729	47	14 45.3
4.0	17 46 12.93	24 56.01	18 47 4.8	0 13 10.7	8.19682	−20	14 44.4
4.5	18 11 8.94	24 48.39	18 33 54.1	0 25 21.1	8.19662	+8	14 44.0
5.0	18 35 57.33	24 39.68	18 8 33.0	0 37 11.2	8.19670	39	14 44.1
5.5	19 0 37.01	24 30.45	17 31 21.8	+0 48 35.6	8.19709	+71	14 44.9
6.0	19 25 7.46	24 21.38	−16 42 46.2	0 59 31.0	8.19780	104	14 46.4
6.5	19 49 28.84	24 13.17	15 43 15.2	1 9 53.5	8.19884	137	14 48.5
7.0	20 13 42.01	24 6.48	14 33 21.7	1 19 40.6	8.20021	170	14 51.3
7.5	20 37 48.49	24 1.99	13 13 41.1	1 28 48.9	8.20191	204	14 54.8
8.0	21 1 50.48	24 0.32	11 44 52.2	1 37 16.2	8.20395	234	14 59.0
8.5	21 25 50.80	24 2.02	10 7 36.0	1 44 58.9	8.20629	264	15 3.9
9.0	21 49 52.82	24 7.63	8 22 37.1	1 51 52.6	8.20893	291	15 9.4
9.5	22 14 0.45	24 17.61	6 30 44.5	1 57 51.2	8.21184	313	15 15.5
10.0	22 38 18.06	24 32.28	4 32 53.3	2 2 48.6	8.21497	331	15 22.1
10.5	23 2 50.34	24 51.91	2 30 4.7	+2 6 36.1	8.21828	+344	15 29.2
11.0	23 27 42.25	25 16.63	− 0 23 28.6	2 9 3.2	8.22172	351	15 36.6
11.5	23 52 58.88	25 46.43	+ 1 45 34.6	2 9 58.5	8.22523	350	15 44.2
12.0	0 18 45.31	26 21.01	3 55 33.1	2 9 9.0	8.22873	344	15 51.8
12.5	0 45 6.32	26 59.88	6 4 42.1	2 6 21.7	8.23217	329	15 59.4
13.0	1 12 6.20	27 42.15	8 11 3.8	2 1 23.5	8.23546	305	16 6.7
13.5	1 39 48.35	28 26.54	10 12 27.3	1 54 5.0	8.23851	274	16 13.5
14.0	2 8 14.89	29 11.35	12 6 32.3	1 44 19.0	8.24125	238	16 19.7
14.5	2 37 26.24	29 54.47	13 50 51.3	1 32 5.1	8.24363	194	16 25.0
15.0	3 7 20.71	30 33.45	15 22 56.4	1 17 30.2	8.24557	147	16 29.4
15.5	3 37 54.16	31 5.77	16 40 26.6	+1 0 49.8	8.24704	+95	16 32.8
16.0	4 8 59.93	31 29.06	+17 41 16.4	0 42 28.4	8.24799	+43	16 35.0
16.5	4 40 28.99	31 41.47	18 23 44.8	0 22 58.3	8.24842	−10	16 36.0
17.0	5 12 10.46	31 41.94	18 46 43.1	+0 2 56.6	8.24832	61	16 35.7
17.5	5 43 52.40	31 30.43	18 49 39.7	−0 16 57.0	8.24771	109	16 34.3
18.0	6 15 22.83	31 7.90	18 32 42.7	0 36 5.2	8.24662	150	16 31.8
18.5	6 46 30.73	30 36.17	17 56 37.5	0 53 56.4	8.24512	187	16 28.4
19.0	7 17 6.90	29 57.53	17 2 41.1	1 10 5.4	8.24325	219	16 24.2
19.5	7 47 4.43	29 14.60	15 52 35.7	1 24 16.2	8.24106	242	16 19.2
20.0	8 16 19.03	28 29.91	14 28 19.5	1 36 20.5	8.23864	260	16 13.8
20.5	8 44 48.94		12 51 59.0		8.23604		16 8.0

Nov. 8 1h 24m.1 Erstes Viertel. Nov. 15 6h 0m.1 Vollmond.

Im Meridian von Berlin.

Datum und Culmination	Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1^h Länge	Decl.	Bew. in 1^h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Gr.
	h m	h m s	s	s	° '	'	h m	° '	
Nov. 1 O	0 37.7	15 17 0	−64.45	129.07	−15 48.9	− 5.6			
U	13 1.5	15 42 52	−64.57	129.49	−16 50.7	− 4.6			
2 O	1 25.4	16 8 48	−64.67	129.78	−17 39.9	− 3.6			
U	13 49.4	16 34 46	−64.73	129.87	−18 16.2	− 2.5			
3 O	2 13.3	17 0 44	−64.73	129.77	−18 39.2	− 1.4			
U	14 37.2	17 26 39	−64.69	129.45	−18 48.7	− 0.2			
4 O	3 1.0	17 52 30	−64.59	128.93	−18 44.9	+ 0.9			
U	15 24.7	18 18 13	−64.45	128.26	−18 27.9	+ 2.0			
5 O	3 48.2	18 43 47	−64.27	127.48	−17 58.0	+ 3.0	18 15.7	−18 54	var.
U	16 11.6	19 9 12	−64.08	126.63	−17 15.7	+ 4.0	18 19.6	−20 36	4.9
6 O	4 34.8	19 34 26	−63.89	125.79	−16 21.3	+ 5.0	19 1.4	−18 53	6.5
U	16 57.8	19 59 30	−63.71	125.02	−15 15.5	+ 5.9	19 16.0	−18 2	3.9
7 O	5 20.7	20 24 27	−63.56	124.40	−13 59.0	+ 6.8	19 52.4	−15 45	5.0
U	17 43.5	20 49 17	−63.45	123.97	−12 32.4	+ 7.6	20 15.3	−15 6	6.7
8 O	6 6.3	21 14 3	−63.42	123.80	−10 56.4	+ 8.4	20 47.8	−11 57	6.5
U	18 29.0	21 38 49	−63.45	123.95	− 9 11.8	+ 9.1	21 4.3	−11 46	4.6
9 O	6 51.8	22 3 40	−63.59	124.48	− 7 19.4	+ 9.7	21 32.6	− 8 18	4.8
U	19 14.8	22 28 39	−63.82	125.43	− 5 20.2	+10.2	21 39.8	− 9 32	5.2
10 O	7 38.0	22 53 53	−64.16	126.82	− 3 15.3	+10.6	22 19.1	− 5 20	5.8
U	20 1.5	23 19 25	−64.62	128.69	− 1 5.8	+11.0	22 32.7	− 4 44	5.5
11 O	8 25.4	23 45 24	−65.20	131.05	+ 1 6.9	+11.2	23 22.0	+ 0 43	5.0
U	20 49.8	0 11 54	−65.89	133.89	+ 3 21.2	+11.2	23 31.4	+ 1 34	5.6
12 O	9 14.9	0 39 1	−66.71	137.19	+ 5 35.2	+11.1	0 20.4	+ 1 24	5.8
U	21 40.7	1 6 50	−67.60	140.90	+ 7 46.9	+10.8	0 27.4	+ 6 25	5.7
13 O	10 7.2	1 35 25	−68.58	144.92	+ 9 53.9	+10.3	1 3.3	+ 9 23	6.5
U	22 34.6	2 4 50	−69.58	149.11	+11 53.5	+ 9.6	1 8.7	+ 7 3	4.2
14 O	11 2.8	2 35 6	−70.57	153.28	+13 43.0	+ 8.6	1 57.4	+13 0	6.5
U	23 31.8	3 6 10	−71.50	157.21	+15 19.6	+ 7.4	2 27.6	+14 36	6.5
15 O	12 1.6	3 37 58	+72.30	160.76	+16 40.6	+ 6.0	2 59.3	+15 29	6.5
—	—	—	—	—	—	—	3 21.5	+18 25	6.5
16 U	0 32.0	4 10 23	+72.92	163.39	+17 43.5	+ 4.4	4 7.0	+17 2	6.4
O	13 2.8	4 43 14	+73.32	165.01	+18 26.5	+ 2.7	4 14.8	+18 30	5.9
17 U	1 33.8	5 16 18	+73.46	165.48	+18 48.2	+ 0.9	5 15.2	+19 43	6.5
O	14 4.8	5 49 21	+73.33	164.75	+18 48.1	− 0.9	5 21.5	+17 53	5.4
18 U	2 35.6	6 22 9	+72.93	162.90	+18 26.5	− 2.7	6 26.7	+17 51	6.5
O	15 5.9	6 54 27	+72.30	160.08	+17 44.4	− 4.3	6 36.8	+17 44	5.1
19 U	3 35.5	7 26 9	+71.50	156.54	+16 43.4	− 5.8	7 28.1	+16 2	5.0
O	16 4.3	7 57 5	+70.58	152.54	+15 25.5	− 7.1	7 33.9	+17 54	5.2
20 U	4 32.3	8 27 11	+69.59	148.35	+13 53.2	− 8.2	8 23.2	+14 32	5.9
O	16 59.5	8 56 27	+68.59	144.19	+12 8.9	− 9.1	8 37.9	+13 2	5.6

Nov. 4 15^h Apogaeum. Nov. 16 16^h Perigaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
Nov. 20.0	8h 16m 19s.03	28m 29s.91	+14° 28′ 19″.5	−1° 36′ 20″.5	8.23864	−260	16′ 13″.8
20.5	8 44 48.94	27 45.60	12 51 59.0	1 46 16.2	8.23604	272	16 8.0
21.0	9 12 34.54	27 3.51	11 5 42.8	1 54 6.3	8.23332	279	16 1.9
21.5	9 39 38.05	26 25.00	9 11 36.5	1 59 57.5	8.23053	279	15 55.7
22.0	10 6 3.05	25 50.94	7 11 39.0	2 3 57.5	8.22774	276	15 49.6
22.5	10 31 53.99	25 21.94	5 7 41.5	2 6 14.5	8.22498	271	15 43.6
23.0	10 57 15.93	24 58.26	3 1 27.0	2 6 56.7	8.22227	261	15 37.7
23.5	11 22 14.19	24 39.88	+ 0 54 30.3	2 6 11.8	8.21966	251	15 32.1
24.0	11 46 54.07	24 26.68	− 1 11 41.5	2 4 5.4	8.21715	238	15 26.8
24.5	12 11 20.75	24 18.34	3 15 46.9	−2 0 42.8	8.21477	−225	15 21.7
25.0	12 35 39.09	24 14.37	− 5 16 29.7	1 56 8.9	8.21252	211	15 16.9
25.5	12 59 53.46	24 14.27	7 12 38.6	1 50 26.9	8.21041	198	15 12.5
26.0	13 24 7.73	24 17.39	9 3 5.5	1 43 40.5	8.20843	183	15 8.3
26.5	13 48 25.12	24 23.03	10 46 46.0	1 35 52.9	8.20660	170	15 4.5
27.0	14 12 48.15	24 30.39	12 22 38.9	1 27 8.2	8.20490	157	15 1.0
27.5	14 37 18.54	24 38.68	13 49 47.1	1 17 30.3	8.20333	143	14 57.7
28.0	15 1 57.22	24 47.05	15 7 17.4	1 7 4.9	8.20190	129	14 54.8
28.5	15 26 44.27	24 54.75	16 14 22.3	0 55 57.7	8.20061	117	14 52.1
29.0	15 51 39.02	25 1.00	17 10 20.0	0 44 16.1	8.19944	102	14 49.7
29.5	16 16 40.02	25 5.20	17 54 36.1	−0 32 8.0	8.19842	− 89	14 47.6
30.0	16 41 45.22	25 6.93	−18 26 44.1	0 19 42.6	8.19753	72	14 45.8
30.5	17 6 52.15	25 5.88	18 46 26.7	−0 7 9.1	8.19681	56	14 44.4
Dec. 1.0	17 31 58.03	25 2.02	18 53 35.8	+0 5 24.0	8.19625	39	14 43.2
1.5	17 57 0.05	24 55.53	18 48 11.8	0 17 47.1	8.19586	− 18	14 42.4
2.0	18 21 55.58	24 46.69	18 30 24.7	0 29 52.3	8.19568	+ 2	14 42.1
2.5	18 46 42.27	24 36.16	18 0 32.4	0 41 32.4	8.19570	24	14 42.1
3.0	19 11 18.43	24 24.55	17 19 0.0	0 52 41.4	8.19594	49	14 42.6
3.5	19 35 42.98	24 12.58	16 26 18.6	1 3 14.7	8.19643	74	14 43.6
4.0	19 59 55.56	24 1.12	15 23 3.9	1 13 8.5	8.19717	102	14 45.1
4.5	20 23 56.68	23 50.91	14 9 55.4	+1 22 19.8	8.19819	+130	14 47.2
5.0	20 47 47.59	23 42.76	−12 47 35.6	1 30 47.0	8.19949	160	14 49.8
5.5	21 11 30.35	23 37.41	11 16 48.6	1 38 27.4	8.20109	190	14 53.1
6.0	21 35 7.76	23 35.51	9 38 21.2	1 45 20.6	8.20299	218	14 57.0
6.5	21 58 43.27	23 37.67	7 53 0.6	1 51 23.3	8.20517	249	15 1.5
7.0	22 22 20.94	23 44.44	6 1 37.3	1 56 32.4	8.20766	275	15 6.7
7.5	22 46 5.38	23 56.26	4 5 4.9	2 0 43.9	8.21041	302	15 12.5
8.0	23 10 1.64	24 13.56	2 4 21.0	2 3 52.8	8.21343	325	15 18.9
8.5	23 34 15.20	24 36.52	− 0 0 28.2	2 5 50.5	8.21668	343	15 25.8
9.0	23 58 51.72	25 5.33	+ 2 5 22.3	2 6 28.6	8.22011	358	15 33.1
9.5	0 23 57.05		4 11 50.9		8.22369		15 40.8

Nov. 21 20h 40m.5 Letzt. Viert. Nov. 29 14h 58m.0 Neumond. Dec. 7 19h 20m.1 Erst. Viert.

Im Meridian von Berlin.

Datum und Culmination	Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Gr.
	h m	h m s	s	s	° ′	′	h m	° ′	
Nov. 20 U	4 32.3	8 27 11	+69.59	148.35	+13 53.2	− 8.2	8 23.2	+14 32	5.9
O	16 59.5	8 56 27	+68.59	144.19	+12 8.9	− 9.1	8 37.9	+13 2	5.6
21 U	5 25.9	9 24 55	+67.63	140.26	+10 14.9	− 9.8	9 26.8	+10 9	5.4
O	17 51.6	9 52 37	+66.73	136.68	+ 8 13.6	−10.4	9 36.0	+10 20	3.8
22 U	6 16.6	10 19 38	+65.92	133.53	+ 6 7.2	−10.7	10 17.9	+ 7 2	6.5
O	18 41.0	10 46 5	+65.24	130.88	+ 3 57.6	−10.9	10 38.3	+ 5 16	6.1
23 U	7 4.9	11 12 3	+64.66	128.75	+ 1 46.5	−10.9	11 8.8	+ 0 28	5.5
O	19 28.5	11 37 38	+64.21	127.12	− 0 24.3	−10.8	11 18.3	+ 0 40	6.2
24 U	7 51.8	12 2 56	+63.89	125.97	− 2 33.3	−10.6	12 1.0	− 2 35	6.4
O	20 14.9	12 28 4	+63.67	125.29	− 4 39.2	−10.3	12 13.2	− 3 24	6.8
25 U	8 37.9	12 53 5	+63.56	125.02	− 6 40.6	− 9.9			
O	21 0.8	13 18 6	+63.55	125.09	− 8 36.2	− 9.4			
26 U	9 23.8	13 43 9	+63.61	125.45	−10 24.9	− 8.7			
O	21 46.9	14 8 17	+63.73	126.04	−12 5.6	− 8.0			
27 U	10 10.2	14 33 34	+63.89	126.75	−13 37.1	− 7.2			
O	22 33.6	14 58 59	+64.07	127.53	−14 58.5	− 6.3			
28 U	10 57.1	15 24 34	+64.25	128.29	−16 8.9	− 5.4			
O	23 20.8	15 50 18	+64.41	128.95	−17 7.6	− 4.4			
29 U	11 44.6	16 16 8	+64.53	129.44	−17 53.8	− 3.3			
—	—	—	—	—	—	—			
30 O	0 8.5	16 42 3	−64.61	129.71	−18 27.0	− 2.2			
U	12 32.4	17 8 0	−64.62	129.74	−18 47.0	− 1.1			
Dec. 1 O	0 56.3	17 33 56	−64.58	129.50	−18 53.6	0.0			
U	13 20.1	17 59 47	−64.47	129.00	−18 46.8	+ 1.1			
2 O	1 43.7	18 25 31	−64.30	128.26	−18 26.8	+ 2.2			
U	14 7.3	18 51 4	−64.10	127.34	−17 54.0	+ 3.3			
3 O	2 30.7	19 16 26	−63.86	126.30	−17 8.9	+ 4.3			
U	14 53.8	19 41 35	−63.60	125.20	−16 12.0	+ 5.2			
4 O	3 16.7	20 6 30	−63.36	124.12	−15 4.1	+ 6.1			
U	15 39.4	20 31 14	−63.13	123.15	−13 45.8	+ 6.9			
5 O	4 1.9	20 55 46	−62.96	122.36	−12 18.0	+ 7.7	20 28.8	−14 4	6.2
U	16 24.2	21 20 11	−62.85	121.82	−10 41.5	+ 8.4	20 45.3	−12 54	6.3
6 O	4 46.5	21 44 31	−62.81	121.59	− 8 57.2	+ 9.0	21 20.0	−10 10	5.7
U	17 8.8	22 8 51	−62.87	121.75	− 7 5.9	+ 9.6	21 32.6	− 8 18	4.8
7 O	5 31.2	22 33 15	−63.04	122.34	− 5 8.6	+10.0	22 4.4	− 8 1	6.5
U	17 53.7	22 57 49	−63.32	123.39	− 3 6.2	+10.4	22 12.0	− 5 53	5.9
8 O	6 16.5	23 22 39	−63.74	124.97	− 0 59.9	+10.7	22 53.3	− 2 55	6.3
U	18 39.7	23 47 52	−64.29	127.09	+ 1 9.2	+10.8	23 10.6	− 4 2	5.6
9 O	7 3.4	0 13 33	−64.98	129.78	+ 3 19.7	+10.9	23 41.4	+ 2 57	5.2
U	19 27.7	0 39 50	−65.79	133.02	+ 5 30.1	+10.8	23 48.1	+ 1 33	6.3

Dec. 2 5^h Apogaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
	h m s	m s	° ′ ″	° ′ ″			′ ″
Dec. 9.0	23 58 51.72	25 5.33	+ 2 5 22.3	+2 6 28.6	8.22011	+358	15 33.1
9.5	0 23 57.05	25 39.97	4 11 50.9	2 5 35.9	8.22369	366	15 40.8
10.0	0 49 37.02	26 20.03	6 17 26.8	2 3 0.3	8.22735	370	15 48.8
10.5	1 15 57.05	27 4.95	8 20 27.1	1 58 28.7	8.23105	363	15 56.9
11.0	1 43 2.00	27 53.67	10 18 55.8	1 51 48.1	8.23468	350	16 4.9
11.5	2 10 55.67	28 44.68	12 10 43.9	1 42 48.1	8.23818	329	16 12.8
12.0	2 39 40.35	29 35.90	13 53 32.0	1 31 21.7	8.24147	298	16 20.2
12.5	3 9 16.25	30 24.78	15 24 53.7	1 17 28.3	8.24445	260	16 26.9
13.0	3 39 41.03	31 8.40	16 42 22.0	1 1 16.2	8.24705	213	16 32.8
13.5	4 10 49.43	31 43.84	17 43 38.2	+0 43 3.3	8.24918	+161	16 37.7
14.0	4 42 33.27	32 8.38	+18 26 41.5	0 23 18.3	8.25079	103	16 41.4
14.5	5 14 41.65	32 20.02	18 49 59.8	+0 2 38.5	8.25182	+ 44	16 43.8
15.0	5 47 1.67	32 17.86	18 52 38.3	−0 18 12.9	8.25226	− 18	16 44.8
15.5	6 19 19.53	32 2.26	18 34 25.4	0 38 31.1	8.25208	79	16 44.4
16.0	6 51 21.79	31 34.62	17 55 54.3	0 57 34.9	8.25129	136	16 42.6
16.5	7 22 56.41	30 57.36	16 58 19.4	1 14 50.5	8.24993	188	16 39.4
17.0	7 53 53.77	30 13.37	15 43 28.9	1 29 53.3	8.24805	233	16 35.1
17.5	8 24 7.14	29 25.63	14 13 35.6	1 42 29.9	8.24572	272	16 29.8
18.0	8 53 32.77	28 36.88	12 31 5.7	1 52 35.7	8.24300	302	16 23.6
18.5	9 22 9.65	27 49.45	10 38 30.0	−2 0 13.8	8.23998	−324	16 16.8
19.0	9 49 59.10	27 5.07	+ 8 38 16.2	2 5 32.9	8.23674	339	16 9.5
19.5	10 17 4.17	26 25.07	6 32 43.3	2 8 44.2	8.23335	346	16 2.0
20.0	10 43 29.24	25 50.18	4 23 59.1	2 10 0.8	8.22989	345	15 54.4
20.5	11 9 19.42	25 20.88	2 13 58.3	2 9 34.8	8.22644	338	15 46.8
21.0	11 34 40.30	24 57.29	+ 0 4 23.5	2 7 38.6	8.22306	328	15 39.4
21.5	11 59 37.59	24 39.25	− 2 3 15.1	2 4 21.3	8.21978	314	15 32.4
22.0	12 24 16.84	24 26.51	4 7 36.4	1 59 51.5	8.21664	295	15 25.7
22.5	12 48 43.35	24 18.67	6 7 27.9	1 54 16.6	8.21369	274	15 19.4
23.0	13 13 2.02	24 15.16	8 1 44.5	1 47 41.9	8.21095	251	15 13.6
23.5	13 37 17.18	24 15.42	9 49 26.4	−1 40 11.9	8.20844	−229	15 8.4
24.0	14 1 32.60	24 18.74	−11 29 38.3	1 31 49.9	8.20615	205	15 3.6
24.5	14 25 51.34	24 24.34	13 1 28.2	1 22 39.9	8.20410	181	14 59.3
25.0	14 50 15.68	24 31.41	14 24 8.1	1 12 45.2	8.20229	158	14 55.6
25.5	15 14 47.09	24 39.16	15 36 53.3	1 2 10.1	8.20071	136	14 52.3
26.0	15 39 26.25	24 46.73	16 39 3.4	0 50 59.2	8.19935	115	14 49.5
26.5	16 4 12.98	24 53.37	17 30 2.6	0 39 18.1	8.19820	94	14 47.2
27.0	16 29 6.35	24 58.34	18 9 20.7	0 27 13.4	8.19726	74	14 45.3
27.5	16 54 4.69	25 1.16	18 36 34.1	0 14 52.7	8.19652	55	14 43.8
28.0	17 19 5.85	25 1.38	18 51 26.8	−0 2 24.1	8.19597	37	14 42.7
28.5	17 44 7.23		18 53 50.9		8.19560		14 41.9

Dec. 14 16h 41.0m Vollmond. Dec. 21 8h 53.8m Letztes Viertel.

Im Meridian von Berlin.

Datum und Culmination		Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Vergl.-Sterne Decl.	Vergl.-Sterne Gr.
		h m	h m s	s	s	° ′	′	h m	° ′	
Dec. 9	O	7 3.4	0 13 33	−64.98	129.78	+ 3 19.7	+10.9	23 41.4	+ 2 57	5.2
	U	19 27.7	0 39 50	−65.79	133.02	+ 5 30.1	+10.8	23 48.1	+ 1 33	6.3
10	O	7 52.6	1 6 49	−66.73	136.78	+ 7 38.6	+10.6	0 27.4	+ 6 25	5.7
	U	20 18.3	1 34 37	−67.77	141.02	+ 9 43.1	+10.1	0 43.3	+ 6 46	6.0
11	O	8 45.0	2 3 17	−68.87	145.62	+11 41.2	+ 9.5	1 32.0	+11 38	5.6
	U	21 12.5	2 32 55	−70.02	150.43	+13 30.5	+ 8.7	1 45.7	+10 33	5.8
12	O	9 41.0	3 3 30	−71.13	155.22	+15 8.3	+ 7.6	2 27.6	+14 36	6.5
	U	22 10.5	3 35 1	−72.17	159.71	+16 31.6	+ 6.3	2 39.2	+14 54	5.8
13	O	10 40.8	4 7 22	−73.05	163.61	+17 37.8	+ 4.7	3 34.0	+16 13	6.4
	U	23 11.8	4 40 25	−73.73	166.60	+18 24.4	+ 3.0	3 47.6	+17 2	6.0
14	O	11 43.3	5 13 57	−74.13	168.41	+18 49.7	+ 1.2	4 40.6	+18 33	6.5
—		—	—	—	—	—	—	4 45.7	+18 40	5.1
15	U	0 15.0	5 47 42	+74.23	168.88	+18 52.5	− 0.7	5 49.2	+19 44	5.9
	O	12 46.6	6 21 25	+74.04	167.94	+18 32.6	− 2.6	5 57.7	+19 42	5.1
16	U	1 18.0	6 54 49	+73.55	165.74	+17 50.6	− 4.4	6 32.1	+16 29	2.0
	O	13 48.8	7 27 40	+72.82	162.49	+16 48.1	− 6.0	6 36.8	+17 44	5.1
17	U	2 18.9	7 59 47	+71.91	158.49	+15 27.2	− 7.4	7 56.0	+16 44	6.4
	O	14 48.1	8 31 4	+70.89	154.05	+13 50.7	− 8.6	8 3.3	+13 56	6.5
18	U	3 16.4	9 1 26	+69.82	149.47	+12 1.3	− 9.6	8 53.2	+12 14	4.3
	O	15 43.8	9 30 54	+68.76	144.99	+10 1.8	−10.3	9 2.5	+11 4	5.0
19	U	4 10.4	9 59 29	+67.74	140.80	+ 7 55.1	−10.8	9 55.1	+ 8 31	5.0
	O	16 36.1	10 27 16	+66.81	137.03	+ 5 43.6	−11.1	10 17.9	+ 7 2	6.5
20	U	5 1.1	10 54 21	+66.00	133.76	+ 3 29.6	−11.2	10 55.6	+ 4 9	5.0
	O	17 25.6	11 20 51	+65.32	131.03	+ 1 15.2	−11.2	11 2.0	+ 2 29	5.7
21	U	5 49.6	11 46 50	+64.75	128.85	− 0 57.9	−11.0	11 44.1	+ 0 14	6.5
	O	18 13.1	12 12 26	+64.32	127.20	− 3 8.2	−10.7	12 1.0	− 2 35	6.4
22	U	6 36.4	12 37 46	+64.01	126.06	− 5 14.2	−10.3	12 34.5	− 5 34	6.5
	O	18 59.5	13 2 54	+63.81	125.38	− 7 14.8	− 9.8	12 42.5	− 5 46	6.1
23	U	7 22.5	13 27 57	+63.71	125.11	− 9 8.8	− 9.2	13 27.9	− 9 40	5.5
	O	19 45.5	13 52 58	+63.70	125.18	−10 55.2	− 8.5	13 40.8	−11 56	6.0
24	U	8 8.6	14 18 2	+63.76	125.54	−12 32.9	− 7.8	14 3.3	−11 22	6.5
	O	20 31.7	14 43 11	+63.87	126.08	−14 1.2	− 7.0	14 13.9	−12 55	4.6
25	U	8 54.9	15 8 28	+64.02	126.76	−15 19.2	− 6.1			
	O	21 18.3	15 33 53	+64.17	127.48	−16 26.0	− 5.1			
26	U	9 41.8	15 59 27	+64.31	128.15	−17 21.1	− 4.1			
	O	22 5.5	16 25 8	+64.43	128.73	−18 3.9	− 3.0			
27	U	10 29.2	16 50 56	+64.51	129.11	−18 33.8	− 2.0			
	O	22 53.0	17 16 46	+64.52	129.28	−18 50.6	− 0.9			
28	U	11 16.8	17 42 37	+64.49	129.19	−18 54.0	+ 0.3			
	O	23 40.6	18 8 26	+64.39	128.84	−18 44.2	+ 1.4			

Dec. 15 2h Perigaeum.

Mittlerer Mittag und Mitternacht.

Datum	AR. app.	Diff.	Decl. app.	Diff.	Log. sin. A. H. Par.	Diff.	Halbm.
Dec. 28.0	17h 19m 5.85s	25m 1.38s	−18° 51′ 26.8″	−0° 2′ 24.1″	8.19597	−37	14′ 42.7″
28.5	17 44 7.23	24 58.86	18 53 50.9	+0 10 3.8	8.19560	20	14 41.9
29.0	18 9 6.09	24 53.59	18 43 47.1	0 22 21.7	8.19540	− 2	14 41.5
29.5	18 33 59.68	24 45.85	18 21 25.4	0 34 21.4	8.19538	+15	14 41.5
30.0	18 58 45.53	24 36.04	17 47 4.0	0 45 54.8	8.19553	31	14 41.8
30.5	19 23 21.57	24 24.75	17 1 9.2	0 56 54.8	8.19584	50	14 42.4
31.0	19 47 46.32	24 12.65	16 4 14.4	1 7 16.0	8.19634	68	14 43.4
31.5	20 11 58.97	24 0.54	14 56 58.4	1 16 52.6	8.19702	86	14 44.8
32.0	20 35 59.51		13 40 5.8		8.19788		14 46.5

Dec. 29 10h 18.4m Neumond.

Phasen des Mondes.

		h	m	
Jan.	1	5	1.4	Letztes Viertel
	9	10	8.2	Neumond
	16	19	32.0	Erstes Viertel
	23	12	59.8	Vollmond
	31	2	2.2	Letztes Viertel
Febr.	8	2	15.1	Neumond
	15	3	50.2	Erstes Viertel
	22	1	57.0	Vollmond
März	1	23	33.0	Letztes Viertel
	9	15	43.8	Neumond
	16	11	6.4	Erstes Viertel
	23	16	14.9	Vollmond
	31	19	17.6	Letztes Viertel
April	8	2	43.7	Neumond
	14	18	19.3	Erstes Viertel
	22	7	43.2	Vollmond
	30	11	51.6	Letztes Viertel
Mai	7	11	38.8	Neumond
	14	2	33.3	Erstes Viertel
	21	23	39.7	Vollmond
	30	0	54.0	Letztes Viertel
Juni	5	19	4.5	Neumond
	12	12	47.4	Erstes Viertel
	20	15	10.3	Vollmond
	28	10	45.4	Letztes Viertel
Juli	5	1	52.8	Neumond
	12	1	40.2	Erstes Viertel
	20	5	38.8	Vollmond
	27	18	8.2	Letztes Viertel
Aug.	3	9	10.8	Neumond
	10	17	17.8	Erstes Viertel
	18	18	56.9	Vollmond
	25	23	58.1	Letztes Viertel
Sept.	1	18	13.0	Neumond
	9	11	8.5	Erstes Viertel
	17	7	17.0	Vollmond
	24	5	25.1	Letztes Viertel
Oct.	1	6	2.7	Neumond
	9	6	14.7	Erstes Viertel
	16	18	54.7	Vollmond
	23	11	51.7	Letztes Viertel
	30	21	7.2	Neumond
Nov.	8	1	24.1	Erstes Viertel
	15	6	0.1	Vollmond
	21	20	40.5	Letztes Viertel
	29	14	58.0	Neumond
Dec.	7	19	20.1	Erstes Viertel
	14	16	41.0	Vollmond
	21	8	53.8	Letztes Viertel
	29	10	18.4	Neumond

Im Meridian von Berlin.

Datum und Culmination		Mittlere Zeit	AR.	Halbe Durchg.-D. Sternzeit	Bew. in 1h Länge	Decl.	Bew. in 1h Länge	Vergl.-Sterne AR.	Decl.	Gr.
Dec. 28	U	11h 16.8m	17h 42m 37s	+64.49s	129.19s	—18° 54.0′	+0.3′			
	O	23 40.6	18 8 26	+64.39	128.84	—18 44.2	+1.4			
29	U	12 4.3	18 34 9	—64.22	128.26	—18 21.2	+2.5			
—		—	—	—	—	—	—			
30	O	0 27.9	18 59 43	—64.02	127.45	—17 45.5	+3.5			
	U	12 51.2	19 25 6	—63.77	126.46	—16 57.5	+4.5			
31	O	1 14.3	19 50 17	—63.50	125.36	—15 57.8	+5.4			
	U	13 37.2	20 15 14	—63.23	124.24	—14 47.1	+6.3			
32	O	1 59.9	20 39 58	—62.98	123.21	—13 26.4	+7.2			

Dec. 29 8h Apogaeum.

Mond im Apogaeum			Mond im Perigaeum		
Jan.	4	17h	Jan.	20	19h
Febr.	1	12	Febr.	16	7
März	1	10	März	13	9
März	29	5	April	10	2
April	25	20	Mai	8	8
Mai	23	4	Juni	5	18
Juni	19	6	Juli	4	3
Juli	16	14	Aug.	1	7
Aug.	13	5	Aug.	28	20
Sept.	9	23	Sept.	23	2
Oct.	7	19	Oct.	19	15
Nov.	4	15	Nov.	16	16
Dec.	2	5	Dec.	15	2
Dec.	29	8			

Krater im Meridian.

Datum	Physische Libration in selenoc. Länge	Physische Libration in selenoc. Breite	Reduction für Meridianbeobachtungen in AR. $\alpha_☾ - \alpha_k$	Diff.		in Decl. $\delta_☾ - \delta_k$	Diff.		Parallaxe lg. sin p_k	Diff.
	′	′	s	s	s	″	″	″		
Jan. 0	−0.3	+0.3	−7.74	+0.38		+176.9	−27.2		8.20864	−460
1	0.2	0.3	−7.36	+0.40	+0.02	+149.7	−31.1	− 3.9	20404	−319
2	0.1	0.3	−6.96			+118.6			20085	
Jan. 16	+0.9	+0.3	−1.14	−1.47		+ 5.6	+21.4		8.23350	+367
17	0.9	0.4	−2.61	1.60	−0.13	+ 27.0	25.0	+ 3.6	23717	321
18	0.8	0.4	−4.21	1.54	+0.06	+ 52.0	28.6	3.6	24038	241
19	0.8	0.4	−5.75	1.26	0.28	+ 80.6	31.2	2.6	24279	+126
20	0.7	0.4	−7.01	0.79	0.47	+111.8	31.3	+ 0.1	24405	− 21
21	0.7	0.4	−7.80	−0.32	0.47	+143.1	28.0	− 3.3	24384	189
22	0.6	0.4	−8.12	+0.03	0.35	+171.1	21.1	6.9	24195	351
23	0.6	0.4	−8.09	0.20	0.17	+192.2	11.8	9.3	23844	489
24	0.6	0.4	−7.89	0.23	+0.03	+204.0	+ 1.6	10.2	23355	586
25	0.6	0.4	−7.66	0.17	−0.06	+205.6	− 8.2	9.8	22769	629
26	0.7	0.4	−7.49	0.12	−0.05	+197.4	17.0	8.8	22140	617
27	0.7	0.4	−7.37	0.12	0.00	+180.4	24.2	7.2	21523	558
28	0.8	0.4	−7.25	0.18	+0.06	+156.2	29.3	5.1	20965	457
29	0.9	0.4	−7.07	0.34	0.16	+126.9	32.4	3.1	20508	327
30	1.0	0.4	−6.73	0.57	0.23	+ 94.5	33.4	− 1.0	20181	184
31	1.2	0.4	−6.16	+0.85	+0.28	+ 61.1	−32.1	+ 1.3	19997	− 34
Febr. 1	1.3	0.4	−5.31			+ 29.0			19963	
Febr. 15	+1.7	+0.5	−6.49	−0.93		+ 71.1	+31.3		8.23814	+ 30
16	1.7	0.5	−7.42	−0.43	+0.50	+102.4	31.1	− 0.2	23844	− 36
17	1.6	0.5	−7.85	+0.03	0.46	+133.5	27.6	3.5	23808	114
18	1.6	0.5	−7.82	0.33	0.30	+161.1	21.4	6.2	23694	202
19	1.5	0.5	−7.49	0.41	+0.08	+182.5	13.0	8.4	23492	297
20	1.5	0.5	−7.08	0.33	−0.08	+195.5	+ 4.1	8.9	23195	385
21	1.5	0.5	−6.75	0.17	0.16	+199.6	− 5.1	9.2	22810	455
22	1.5	0.5	−6.58	+0.02	0.15	+194.5	13.5	8.4	22355	495
23	1.6	0.5	−6.56	−0.06	−0.08	+181.0	21.0	7.5	21860	501
24	1.6	0.5	−6.62	−0.04	+0.02	+160.0	26.8	5.8	21359	470
25	1.7	0.5	−6.66	+0.10	0.14	+133.2	31.1	4.3	20889	401
26	1.8	0.5	−6.56	0.36	0.26	+102.1	33.0	− 1.9	20488	298
27	1.9	0.5	−6.20	0.70	0.34	+ 69.1	32.7	+ 0.3	20190	168
28	2.0	0.5	−5.50	1.05	0.35	+ 36.4	30.0	2.7	20022	− 25
März 1	2.1	0.5	−4.45	+1.34	+0.29	+ 6.4	−25.1	+ 4.9	19997	+125
2	2.2	0.6	−3.11			− 18.7			20122	
März 16	+2.2	+0.6	−9.29	+0.12		+126.5	+29.9		8.23766	−258
17	2.2	0.6	−9.17	0.58	+0.46	+156.4	23.4	− 6.5	23508	296
18	2.1	0.6	−8.59	0.77	+0.19	+179.8	14.8	8.6	23212	325
19	2.0	0.6	−7.82	+0.70	−0.07	+194.6	+ 5.6	9.2	22887	−351
20	2.0	0.6	−7.12		−0.20	+200.2		− 8.9	22536	

Krater im Meridian.

Datum		Physische Libration in selenoc. Länge	Physische Libration in selenoc. Breite	Reduction für Meridianbeobachtungen in AR. $\alpha_☾ - \alpha_k$	Diff.		in Decl. $\delta_☾ - \delta_k$	Diff.		Parallaxe lg. sin p_k	Diff.
		′	′	s	s	s	″	″	″		
März	20	+2.0	+0.6	−7.12	+0.50	−0.20	+200.2	− 3.3	−8.9	8.22536	−372
	21	2.0	0.6	−6.62	0.25	0.25	+196.9	11.9	8.6	22164	388
	22	2.0	0.6	−6.37	+0.05	0.20	+185.0	18.9	7.0	21776	398
	23	2.0	0.6	−6.32	−0.04	−0.09	+166.1	25.0	6.1	21378	392
	24	2.1	0.6	−6.36	−0.01	+0.03	+141.1	29.7	4.7	20986	363
	25	2.2	0.6	−6.37	+0.17	0.18	+111.4	32.5	2.8	20623	311
	26	2.2	0.7	−6.20	0.50	0.33	+ 78.9	33.1	−0.6	20312	232
	27	2.3	0.7	−5.70	0.89	0.39	+ 45.8	31.4	+1.7	20080	129
	28	2.4	0.7	−4.81	1.27	0.38	+ 14.4	27.1	4.3	19951	− 5
	29	2.5	0.7	−3.54	1.54	0.27	− 12.7	20.9	6.2	19946	+134
	30	2.6	0.7	−2.00	1.63	+0.09	− 33.6	13.4	7.5	20080	278
	31	2.7	0.7	−0.37	+1.47	−0.16	− 47.0	− 5.7	+7.7	20358	+418
April	1	2.8	0.7	+1.10			− 52.7			20776	
April	15	+2.1	+0.7	−9.47	+0.90		+197.3	+ 8.6		8.23067	−493
	16	2.1	0.7	−8.57	0.77	−0.13	+205.9	− 1.2	−9.8	22574	472
	17	2.0	0.7	−7.80	0.55	0.22	+204.7	10.1	8.9	22102	440
	18	2.0	0.7	−7.25	0.31	0.24	+194.6	17.7	7.6	21662	404
	19	2.0	0.7	−6.94	0.13	0.18	+176.9	24.0	6.3	21258	364
	20	2.0	0.8	−6.81	0.07	−0.06	+152.9	28.8	4.8	20894	325
	21	2.1	0.8	−6.74	0.14	+0.07	+124.1	32.1	3.3	20569	279
	22	2.1	0.8	−6.60	0.38	0.24	+ 92.0	33.6	−1.5	20290	224
	23	2.2	0.8	−6.22	0.71	0.33	+ 58.4	32.6	+1.0	20066	155
	24	2.3	0.8	−5.51	1.12	0.41	+ 25.8	29.4	3.2	19911	− 72
	25	2.3	0.8	−4.39	1.48	0.36	− 3.6	23.7	5.7	19839	+ 30
	26	2.4	0.8	−2.91	1.68	+0.20	− 27.3	16.4	7.3	19869	145
	27	2.5	0.8	−1.23	1.68	0.00	− 43.7	8.3	8.1	20014	272
	28	2.5	0.8	+0.45	1.47	−0.21	− 52.0	− 0.5	7.8	20286	404
	29	2.6	0.8	+1.92	+1.03	−0.44	− 52.5	+ 6.0	+6.5	20690	+529
	30	2.6	0.8	+2.95			− 46.5			21219	
Mai	14	+1.6	+0.8	−9.21	+0.59		+212.8	− 7.1		8.22564	−606
	15	1.5	0.9	−8.62	0.43	−0.16	+205.7	15.7	−8.6	21958	541
	16	1.5	0.9	−8.19	0.27	0.16	+190.0	22.8	7.1	21417	465
	17	1.5	0.9	−7.92	0.18	−0.09	+167.2	28.2	5.4	20952	387
	18	1.5	0.9	−7.74	0.20	+0.02	+139.0	31.9	3.7	20565	305
	19	1.6	0.9	−7.54	0.34	0.14	+107.1	33.9	−2.0	20260	231
	20	1.6	0.9	−7.20	0.62	0.28	+ 73.2	33.8	+0.1	20029	157
	21	1.7	0.9	−6.58	0.97	0.35	+ 39.4	31.4	2.4	19872	85
	22	1.7	0.9	−5.61	1.35	0.38	+ 8.0	26.6	4.8	19787	− 9
	23	1.8	0.9	−4.26	1.62	0.27	− 18.6	19.8	6.8	19778	+ 74
	24	1.8	0.9	−2.64	1.72	+0.10	− 38.4	11.8	8.0	19852	167
	25	1.9	0.9	−0.92	+1.62	−0.10	− 50.2	− 3.5	8.3	20019	+266
	26	1.9	0.9	+0.70		−0.28	− 53.7		+7.5	20285	

Krater im Meridian.

Datum		Physische Libration in selenoc.		Reduction für Meridianbeobachtungen							
				in AR.			in Decl.			Parallaxe	
		Länge	Breite	$\alpha_☾ - \alpha_k$	Diff.		$\delta_☾ - \delta_k$	Diff.		lg. sin p_k	Diff.
		′	′	s	s	s	″	″	″		
Mai	26	+1.9	+0.9	+0.70	+1.34	−0.28	− 53.7	+ 4.0	+7.5	8.20285	+377
	27	2.0	0.9	+2.04	0.90	0.44	− 49.7	10.0	6.0	20662	484
	28	2.0	0.9	+2.94	+0.38	0.52	− 39.7	14.3	4.3	21146	585
	29	1.9	0.9	+3.32	−0.19	−0.57	− 25.4	+16.7	+2.4	21731	+668
	30	1.9	0.9	+3.13			− 8.7			22399	
Juni	13	+0.7	+1.0	−9.01	+0.13		+180.2	−26.8		8.21402	−536
	14	0.6	1.0	−8.88	0.17	+0.04	+153.4	31.4	−4.6	20866	427
	15	0.7	1.0	−8.71	0.31	0.14	+122.0	34.1	2.7	20439	317
	16	0.7	1.0	−8.40	0.55	0.24	+ 87.9	34.8	−0.7	20122	211
	17	0.7	1.0	−7.85	0.87	0.32	+ 53.1	33.0	+1.8	19911	112
	18	0.8	1.0	−6.98	1.23	0.36	+ 20.1	29.1	3.9	19799	− 24
	19	0.8	1.0	−5.75	1.51	0.28	− 9.0	22.9	6.2	19775	+ 56
	20	0.9	1.0	−4.24	1.67	+0.16	− 31.9	15.3	7.6	19831	133
	21	0.9	1.0	−2.57	1.63	−0.04	− 47.2	− 7.1	8.2	19964	202
	22	1.0	1.0	−0.94	1.42	0.21	− 54.3	+ 0.9	8.0	20166	278
	23	1.0	1.0	+0.48	1.08	0.34	− 53.4	7.7	6.8	20444	351
	24	1.0	1.0	+1.56	0.65	0.43	− 45.7	13.0	5.3	20795	430
	25	1.0	1.0	+2.21	+0.18	0.47	− 32.7	16.7	3.7	21225	505
	26	1.0	1.0	+2.39	−0.28	0.46	− 16.0	18.9	2.2	21730	574
	27	0.9	1.0	+2.11	−0.76	−0.48	+ 2.9	+20.1	+1.2	22304	+620
	28	0.8	1.0	+1.35			+ 23.0			22924	
Juli	12	−0.4	+1.1	−9.48	+0.14		+134.2	−33.6		8.20922	−462
	13	0.4	1.1	−9.34	0.41	+0.27	+100.6	35.1	−1.5	20460	334
	14	0.3	1.1	−8.93	0.75	0.34	+ 65.5	34.4	+0.7	20126	202
	15	0.3	1.1	−8.18	1.11	0.36	+ 31.1	31.1	3.3	19924	− 81
	16	0.2	1.1	−7.07	1.43	0.32	0.0	25.6	5.5	19843	+ 31
	17	0.2	1.1	−5.64	1.61	0.18	− 25.6	18.5	7.1	19874	124
	18	0.1	1.1	−4.03	1.62	+0.01	− 44.1	10.3	8.2	19998	202
	19	−0.1	1.1	−2.41	1.43	−0.19	− 54.4	− 2.4	7.9	20200	264
	20	0.0	1.1	−0.98	1.10	0.33	− 56.8	+ 4.9	7.3	20464	316
	21	0.0	1.1	+0.12	0.69	0.41	− 51.9	10.8	5.9	20780	357
	22	0.0	1.1	+0.81	+0.26	0.43	− 41.1	15.2	4.4	21137	394
	23	0.0	1.1	+1.07	−0.15	0.41	− 25.9	18.4	3.2	21531	428
	24	−0.1	1.1	+0.92	0.53	0.38	− 7.5	20.5	2.1	21959	459
	25	0.1	1.1	+0.39	0.83	0.30	+ 13.0	22.0	1.5	22418	480
	26	0.2	1.1	−0.44	1.06	0.23	+ 35.0	23.2	1.2	22898	483
	27	0.3	1.1	−1.50	−1.19	−0.13	+ 58.2	+24.3	+1.1	23381	+463
	28	0.4	1.1	−2.69			+ 82.5			23844	
Aug.	11	−1.2	+1.2	−8.91	+0.95		+ 40.9	−32.7		8.20188	−196
	12	1.2	1.2	−7.96		+0.40	+ 8.2		+4.8	19992	

Krater im Meridian.

Datum	Physische Libration in selenoc.		Reduction für Meridianbeobachtungen							
			in AR.			in Decl.			Parallaxe	
	Länge	Breite	$\alpha_{☾} - \alpha_k$	Diff.		$\delta_{☾} - \delta_k$	Diff.		lg. sin p_k	Diff.
Aug. 12	−1.2′	+1.2′	−7.96ˢ	+1.35ˢ	+0.40ˢ	+ 8.2″	−27.9″	+4.8″	8.19992	− 54
13	1.1	1.2	−6.61	1.58	0.23	− 19.7	21.1	6.8	19938	+ 78
14	1.1	1.2	−5.03	1.65	+0.07	− 40.8	13.2	7.9	20016	194
15	1.0	1.2	−3.38	1.50	−0.15	− 54.0	− 5.1	8.1	20210	282
16	1.0	1.2	−1.88	1.15	0.35	− 59.1	+ 2.4	7.5	20492	351
17	0.9	1.2	−0.73	0.72	0.43	− 56.7	8.6	6.2	20843	391
18	0.9	1.2	−0.01	+0.23	0.49	− 48.1	13.4	4.8	21234	407
19	0.9	1.2	+0.22	−0.23	0.46	− 34.7	16.9	3.5	21641	408
20	0.9	1.2	−0.01	0.63	0.40	− 17.8	19.5	2.6	22049	389
21	1.0	1.2	−0.64	0.92	0.29	+ 1.7	21.7	2.2	22438	367
22	1.0	1.2	−1.56	1.07	0.15	+ 23.4	23.6	1.9	22805	338
23	1.1	1.2	−2.63	1.09	−0.02	+ 47.0	25.4	1.8	23143	302
24	1.2	1.2	−3.72	0.97	+0.12	+ 72.4	26.5	+1.1	23445	267
25	1.3	1.2	−4.69	−0.71	+0.26	+ 98.9	+26.5	0.0	23712	+215
26	1.4	1.2	−5.40			+125.4			23927	
Sept. 9	−1.8	+1.3	−7.17	+1.54		− 13.1	−23.7		8.20028	− 33
10	1.7	1.3	−5.63	1.71	+0.17	− 36.8	15.8	+7.9	19995	+114
11	1.7	1.3	−3.92	1.65	−0.06	− 52.6	− 7.4	8.4	20109	250
12	1.6	1.3	−2.27	1.37	0.28	− 60.0	+ 0.4	7.8	20359	365
13	1.5	1.3	−0.90	0.91	0.46	− 59.6	7.2	6.8	20724	448
14	1.5	1.3	+0.01	+0.35	0.56	− 52.4	12.2	5.0	21172	497
15	1.4	1.3	+0.36	−0.21	0.56	− 40.2	15.7	3.5	21669	507
16	1.4	1.3	+0.15	0.73	0.52	− 24.5	18.3	2.6	22176	482
17	1.4	1.3	−0.58	1.14	0.41	− 6.2	20.2	1.9	22658	421
18	1.5	1.3	−1.72	1.39	0.25	+ 14.0	22.6	2.4	23079	338
19	1.5	1.3	−3.11	1.46	−0.07	+ 36.6	24.9	2.3	23417	245
20	1.6	1.3	−4.57	1.29	+0.17	+ 61.5	27.3	2.4	23662	152
21	1.7	1.3	−5.86	0.92	0.37	+ 88.8	28.2	+0.9	23814	+ 66
22	1.8	1.3	−6.78	−0.42	0.50	+117.0	27.1	−1.1	23880	− 8
23	1.9	1.3	−7.20	0.00	0.42	+144.1	23.3	3.8	23872	74
24	2.0	1.3	−7.20	+0.24	+0.24	+167.4	+17.1	−6.2	23798	−134
25	2.1	1.3	−6.96			+184.5			23664	
Oct. 9	−1.8	+1.3	−2.59	+1.64		− 59.1	− 1.5		8.20097	+280
10	1.7	1.3	−0.95	1.28	−0.36	− 60.6	+ 5.9	+7.4	20377	416
11	1.6	1.3	+0.33	0.74	0.54	− 54.7	11.9	6.0	20793	525
12	1.6	1.3	+1.07	+0.13	0.61	− 42.8	15.7	3.8	21318	601
13	1.5	1.3	+1.20	−0.49	0.62	− 27.1	18.2	2.5	21919	631
14	1.5	1.3	+0.71	1.06	0.57	− 8.9	19.5	1.3	22550	606
15	1.5	1.3	−0.35	1.54	0.48	+ 10.6	20.8	1.3	23156	529
16	1.5	1.3	−1.89	−1.82	0.28	+ 31.4	+22.8	2.0	23685	+404
17	1.6	1.4	−3.71		−0.04	+ 54.2		+2.7	24089	

Krater im Meridian.

Datum	Physische Libration in selenoc. Länge	Physische Libration in selenoc. Breite	Reduction für Meridianbeobachtungen: in AR. $\alpha_{☾} - \alpha_k$	Diff.	Diff.	in Decl. $\delta_{☾} - \delta_k$	Diff.	Diff.	Parallaxe lg. sin p_k	Diff.
Oct. 17	−1.6	+1.4	− 3.71	−1.86	−0.04	+ 54.2	+25.5	+2.7	8.24089	+248
18	1.6	1.4	− 5.57	1.58	+0.28	+ 79.7	28.1	2.6	24337	+ 84
19	1.7	1.4	− 7.15	1.04	0.54	+107.8	28.8	+0.7	24421	− 72
20	1.8	1.4	− 8.19	−0.42	0.62	+136.6	26.5	−2.3	24349	201
21	1.9	1.4	− 8.61	+0.09	0.51	+163.1	21.0	5.5	24148	293
22	1.9	1.4	− 8.52	0.35	0.26	+184.1	12.9	8.1	23855	353
23	2.0	1.4	− 8.17	+0.36	+0.01	+197.0	+ 4.0	−8.9	23502	−386
24	2.1	1.4	− 7.81			+201.0			23116	
Nov. 7	−1.3	+1.4	+ 0.12	+1.20		− 56.0	+11.0		8.20281	+419
8	1.2	1.4	+ 1.32	0.67	−0.53	− 45.0	16.1	+5.1	20700	548
9	1.2	1.4	+ 1.99	+0.08	0.59	− 28.9	19.2	3.1	21248	653
10	1.1	1.4	+ 2.07	−0.51	0.59	− 9.7	20.6	1.4	21901	716
11	1.1	1.4	+ 1.56	1.11	0.60	+ 10.9	21.0	0.4	22617	724
12	1.1	1.4	+ 0.45	1.60	0.49	+ 31.9	21.3	0.3	23341	669
13	1.1	1.4	− 1.15	1.96	0.36	+ 53.2	22.5	1.2	24010	543
14	1.1	1.4	− 3.11	2.06	−0.10	+ 75.7	24.7	2.2	24553	358
15	1.2	1.4	− 5.17	1.83	+0.23	+100.4	26.9	2.2	24911	+139
16	1.2	1.4	− 7.00	1.31	0.52	+127.3	27.4	+0.5	25050	− 89
17	1.3	1.4	− 8.31	0.68	0.63	+154.7	24.3	−3.1	24961	290
18	1.4	1.4	− 8.99	−0.19	0.49	+179.0	17.8	6.5	24671	444
19	1.4	1.4	− 9.18	+0.09	0.28	+196.8	+ 8.8	9.0	24227	538
20	1.5	1.4	− 9.09	0.13	+0.04	+205.6	− 0.9	9.7	23689	578
21	1.5	1.4	− 8.96	+0.04	−0.09	+204.7	10.0	9.1	23111	573
22	1.6	1.4	− 8.92	−0.09	−0.13	+194.7	−18.1	−8.1	22538	−540
23	1.6	1.4	− 9.01			+176.6			21998	
Dec. 7	−0.4	+1.5	+ 2.24	+0.12		− 13.2	+22.0		8.21080	+625
8	0.3	1.5	+ 2.36	−0.39	−0.51	+ 8.8	22.9	+0.9	21705	713
9	0.3	1.5	+ 1.97	0.86	0.47	+ 31.7	22.5	−0.4	22418	762
10	0.3	1.5	+ 1.11	1.31	0.45	+ 54.2	22.0	0.5	23180	750
11	0.3	1.5	− 0.20	1.66	0.35	+ 76.2	21.8	−0.2	23930	667
12	0.3	1.5	− 1.86	1.84	−0.18	+ 98.0	22.7	+0.9	24597	509
13	0.4	1.5	− 3.70	1.79	+0.05	+120.7	23.6	+0.9	25106	284
14	0.4	1.5	− 5.49	1.48	0.31	+144.3	23.4	−0.2	25390	+ 23
15	0.5	1.5	− 6.97	1.06	0.42	+167.7	20.2	3.2	25413	−240
16	0.6	1.5	− 8.03	0.70	0.36	+187.9	13.7	6.5	25173	458
17	0.6	1.5	− 8.73	0.48	0.22	+201.6	+ 4.8	8.9	24715	616
18	0.6	1.5	− 9.21	0.37	0.11	+206.4	− 5.0	9.8	24099	701
19	0.7	1.5	− 9.58	0.37	0.00	+201.4	14.3	9.3	23398	716
20	0.7	1.5	− 9.95	0.34	0.03	+187.1	22.3	8.0	22682	679
21	0.7	1.5	−10.29	−0.27	+0.07	+164.8	−28.6	−6.3	22003	−608
22	0.6	1.5	−10.56			+136.2			21395	

0h Mittl. Zeit		Lage gegen den Erd-Aequator.							
		i		Δ		Ω'		Δ − ☊	
Jan.	0	24° 37′.57	52	38° 21′.41	30′.31	2° 22′.50	1′.59	357° 49′.84	1′.46
	10	24 38.09	52	37 51.10	30.30	2 20.91	1.61	357 51.30	1.48
	20	24 38.61	51	37 20.80	30.29	2 19.30	1.62	357 52.78	1.48
	30	24 39.12	51	36 50.51	30.28	2 17.68	1.62	357 54.26	1.49
Febr.	9	24 39.63	50	36 20.23	30.28	2 16.06	1.63	357 55.75	1.50
	19	24 40.13	49	35 49.95	30.26	2 14.43	1.64	357 57.25	1.50
März	1	24 40.62	48	35 19.69	30.26	2 12.79	1.66	357 58.75	1.51
	11	24 41.10	48	34 49.43	30.25	2 11.13	1.67	358 0.26	1.53
	21	24 41.58	47	34 19.18	30.24	2 9.46	1.67	358 1.79	1.53
	31	24 42.05	47	33 48.94	30.23	2 7.79	1.68	358 3.32	1.54
April	10	24 42.52	46	33 18.71	30.23	2 6.11	1.70	358 4.86	1.54
	20	24 42.98	45	32 48.48	30.22	2 4.41	1.70	358 6.40	1.56
	30	24 43.43	44	32 18.26	30.20	2 2.71	1.71	358 7.96	1.57
Mai	10	24 43.87	44	31 48.06	30.20	2 1.00	1.72	358 9.53	1.57
	20	24 44.31	43	31 17.86	30.19	1 59.28	1.72	358 11.10	1.58
	30	24 44.74	43	30 47.67	30.19	1 57.56	1.74	358 12.68	1.59
Juni	9	24 45.17	42	30 17.48	30.17	1 55.82	1.75	358 14.27	1.60
	19	24 45.59	42	29 47.31	30.17	1 54.07	1.75	358 15.87	1.60
	29	24 46.01	41	29 17.14	30.16	1 52.32	1.76	358 17.47	1.61
Juli	9	24 46.42	40	28 46.98	30.16	1 50.56	1.77	358 19.08	1.62
	19	24 46.82	40	28 16.82	30.15	1 48.79	1.78	358 20.70	1.62
	29	24 47.22	39	27 46.67	30.14	1 47.01	1.79	358 22.32	1.63
Aug.	8	24 47.61	38	27 16.53	30.13	1 45.22	1.79	358 23.95	1.64
	18	24 47.99	38	26 46.40	30.13	1 43.43	1.80	358 25.59	1.65
	28	24 48.37	37	26 16.27	30.12	1 41.63	1.81	358 27.24	1.65
Sept.	7	24 48.74	37	25 46.15	30.11	1 39.82	1.82	358 28.89	1.66
	17	24 49.11	36	25 16.04	30.10	1 38.00	1.82	358 30.55	1.67
	27	24 49.47	34	24 45.94	30.10	1 36.18	1.83	358 32.22	1.67
Oct.	7	24 49.81	34	24 15.84	30.10	1 34.35	1.84	358 33.89	1.68
	17	24 50.15	33	23 45.74	30.09	1 32.51	1.84	358 35.57	1.68
	27	24 50.48	33	23 15.65	30.08	1 30.67	1.85	358 37.25	1.69
Nov.	6	24 50.81	32	22 45.57	30.08	1 28.82	1.85	358 38.94	1.70
	16	24 51.13	31	22 15.49	30.07	1 26.97	1.86	358 40.64	1.70
	26	24 51.44	31	21 45.42	30.07	1 25.11	1.87	358 42.34	1.71
Dec.	6	24 51.75	30	21 15.35	30.06	1 23.24	1.88	358 44.05	1.71
	16	24 52.05	30	20 45.29	30.05	1 21.36	1.88	358 45.76	1.72
	26	24 52.35	28	20 15.24	30.05	1 19.48	1.88	358 47.48	1.72
	36	24 52.63		19 45.19		1 17.60		358 49.20	

0h Mittl. Zeit		Aufst. Knoten der Mondbahn °	′	″	Mittlere Länge des Mondes °	′	″
Jan.	0	220	31	34.3	168	43	31.0
	10	219	59	48.0	300	29	21.3
	20	219	28	1.6	72	15	11.6
	30	218	56	15.3	204	1	1.8
Febr.	9	218	24	28.9	335	46	52.1
	19	217	52	42.6	107	32	42.4
März	1	217	20	56.2	239	18	32.7
	11	216	49	9.9	11	4	23.0
	21	216	17	23.6	142	50	13.3
	31	215	45	37.2	274	36	3.6
April	10	215	13	50.9	46	21	53.9
	20	214	42	4.5	178	7	44.2
	30	214	10	18.2	309	53	34.5
Mai	10	213	38	31.8	81	39	24.8
	20	213	6	45.5	213	25	15.1
	30	212	34	59.1	345	11	5.4
Juni	9	212	3	12.8	116	56	55.7
	19	211	31	26.4	248	42	46.0
	29	210	59	40.1	20	28	36.2
Juli	9	210	27	53.8	152	14	26.5
	19	209	56	7.4	284	0	16.8
	29	209	24	21.1	55	46	7.1
Aug.	8	208	52	34.7	187	31	57.4
	18	208	20	48.4	319	17	47.7
	28	207	49	2.0	91	3	38.0
Sept.	7	207	17	15.7	222	49	28.3
	17	206	45	29.3	354	35	18.6
	27	206	13	43.0	126	21	8.9
Oct.	7	205	41	56.6	258	6	59.2
	17	205	10	10.3	29	52	49.5
	27	204	38	24.0	161	38	39.8
Nov.	6	204	6	37.6	293	24	30.1
	16	203	34	51.3	65	10	20.3
	26	203	3	4.9	196	56	10.6
Dec.	6	202	31	18.6	328	42	0.9
	16	201	59	32.2	100	27	51.2
	26	201	27	45.9	232	13	41.5
	36	200	55	59.5	3	59	31.8

Bewegung der mittleren Länge des Mondes nach mittlerer Sonnenzeit

d	°	′	″
0	0	0	0.0
1	13	10	35.0
2	26	21	10.1
3	39	31	45.1
4	52	42	20.1
5	65	52	55.1
6	79	3	30.2
7	92	14	5.2
8	105	24	40.2
9	118	35	15.2
10	131	45	50.3

h	°	′	″
0	0	0	0.0
1	0	32	56.5
2	1	5	52.9
3	1	38	49.4
4	2	11	45.8
5	2	44	42.3
6	3	17	38.8
7	3	50	35.2
8	4	23	31.7
9	4	56	28.1
10	5	29	24.6
11	6	2	21.1
12	6	35	17.5
13	7	8	14.0
14	7	41	10.4
15	8	14	6.9
16	8	47	3.4
17	9	19	59.8
18	9	52	56.3
19	10	25	52.7
20	10	58	49.2
21	11	31	45.6
22	12	4	42.1
23	12	37	38.5
24	13	10	35.0

m	′	″	m	′	″
0	0	0.0	35	19	12.9
1	0	32.9	36	19	45.9
2	1	5.9	37	20	18.8
3	1	38.8	38	20	51.8
4	2	11.8	39	21	24.7
5	2	44.7	40	21	57.7
6	3	17.6	41	22	30.6
7	3	50.6	42	23	3.5
8	4	23.5	43	23	36.5
9	4	56.5	44	24	9.4
10	5	29.4	45	24	42.3
11	6	2.4	46	25	15.3
12	6	35.3	47	25	48.2
13	7	8.2	48	26	21.2
14	7	41.2	49	26	54.1
15	8	14.1	50	27	27.1
16	8	47.1	51	28	0.0
17	9	20.0	52	28	32.9
18	9	52.9	53	29	5.9
19	10	25.9	54	29	38.8
20	10	58.8	55	30	11.7
21	11	31.8	56	30	44.7
22	12	4.7	57	31	17.6
23	12	37.6	58	31	50.6
24	13	10.6	59	32	23.5
25	13	43.5	60	32	56.5
26	14	16.5			
27	14	49.4			
28	15	22.3			
29	15	55.3			
30	16	28.2			
31	17	1.2			
32	17	34.1			
33	18	7.1			
34	18	40.0			

s	″
0	0.0
10	5.5
20	11.0
30	16.5
40	22.0
50	27.5
60	32.9

Meridian und Polhöhe von Berlin.

Datum	SONNE Unterg. h m	SONNE Aufg. h m	MOND Aufg. h m	MOND Unterg. h m
Jan. 1	3 53	20 13	12 49	23 33
2	3 55	20 13	13 54	23 57
3	3 56	20 13	14 58	—
			Unterg.	Aufg.
4	3 57	20 13	0 24	16 0
5	3 58	20 13	0 56	16 58
6	3 59	20 12	1 34	17 52
7	4 1	20 12	2 19	18 40
8	4 2	20 11	3 11	19 22
9	4 3	20 11	4 10	19 58
10	4 5	20 10	5 15	20 29
11	4 6	20 9	6 23	20 56
12	4 8	20 9	7 34	21 20
13	4 9	20 8	8 46	21 43
14	4 11	20 7	9 59	22 6
15	4 12	20 6	11 14	22 31
16	4 14	20 5	12 30	22 58
17	4 15	20 4	13 47	23 31
18	4 17	20 3	15 2	—
			Aufg.	Unterg.
19	4 19	20 2	0 11	16 14
20	4 20	20 1	1 0	17 19
21	4 22	20 0	2 0	18 13
22	4 24	19 58	3 8	18 58
23	4 26	19 57	4 23	19 34
24	4 28	19 56	5 40	20 4
25	4 29	19 55	6 56	20 30
26	4 31	19 53	8 10	20 53
27	4 33	19 52	9 22	21 15
28	4 35	19 50	10 31	21 37
29	4 37	19 49	11 38	22 1
30	4 39	19 47	12 44	22 27
31	4 41	19 46	13 47	22 57
Febr. 1	4 42	19 44	14 46	23 32
2	4 44	19 42	15 42	—
			Unterg.	Aufg.
3	4 46	19 41	0 13	16 33
4	4 48	19 39	1 2	17 17
5	4 50	19 37	1 58	17 56

Datum	SONNE Unterg. h m	SONNE Aufg. h m	MOND Unterg. h m	MOND Aufg. h m
Febr. 6	4 52	19 36	3 1	18 29
7	4 54	19 34	4 8	18 58
8	4 56	19 32	5 19	19 24
9	4 58	19 30	6 32	19 48
10	5 0	19 28	7 47	20 12
11	5 1	19 26	9 3	20 37
12	5 3	19 24	10 20	21 4
13	5 5	19 22	11 36	21 35
14	5 7	19 20	12 51	22 12
15	5 9	19 18	14 3	22 57
16	5 11	19 16	15 8	23 51
17	5 13	19 14	16 5	—
			Aufg.	Unterg.
18	5 15	19 12	0 54	16 52
19	5 17	19 10	2 4	17 31
20	5 19	19 8	3 18	18 3
21	5 21	19 6	4 33	18 30
22	5 22	19 4	5 47	18 55
23	5 24	19 2	7 0	19 18
24	5 26	19 0	8 11	19 40
25	5 28	18 57	9 20	20 3
26	5 30	18 55	10 27	20 29
27	5 32	18 53	11 32	20 58
28	5 33	18 51	12 33	21 31
März 1	5 35	18 49	13 30	22 10
2	5 37	18 46	14 23	22 55
3	5 39	18 44	15 10	23 47
4	5 41	18 42	15 51	—
			Unterg.	Aufg.
5	5 43	18 40	0 46	16 26
6	5 45	18 37	1 51	16 57
7	5 47	18 35	3 0	17 25
8	5 48	18 33	4 12	17 50
9	5 50	18 30	5 27	18 15
10	5 52	18 28	6 44	18 40
11	5 54	18 26	8 2	19 7
12	5 56	18 23	9 21	19 38
13	5 57	18 21	10 39	20 14
14	5 59	18 19	11 53	20 57
15	6 1	18 17	13 1	21 48

Meridian und Polhöhe von Berlin.

Datum		SONNE		MOND	
		Unterg.	Aufg.	Unterg.	Aufg.
		h m	h m	h m	h m
März	16	6 3	18 14	14 0	22 48
	17	6 5	18 12	14 50	23 55
	18	6 6	18 10	15 31	—
				Aufg.	Unterg.
	19	6 8	18 7	1 6	16 4
	20	6 10	18 5	2 18	16 32
	21	6 12	18 2	3 31	16 57
	22	6 13	18 0	4 43	17 20
	23	6 15	17 58	5 54	17 43
	24	6 17	17 55	7 3	18 6
	25	6 18	17 53	8 11	18 31
	26	6 20	17 50	9 17	18 59
	27	6 22	17 48	10 20	19 30
	28	6 24	17 46	11 19	20 6
	29	6 25	17 43	12 13	20 49
	30	6 27	17 41	13 2	21 38
	31	6 29	17 39	13 45	22 33
April	1	6 31	17 36	14 22	23 34
	2	6 32	17 34	14 55	—
				Unterg.	Aufg.
	3	6 34	17 32	0 40	15 23
	4	6 36	17 29	1 50	15 49
	5	6 38	17 27	3 2	16 14
	6	6 39	17 25	4 18	16 40
	7	6 41	17 22	5 36	17 6
	8	6 43	17 20	6 56	17 36
	9	6 44	17 18	8 17	18 11
	10	6 46	17 16	9 35	18 52
	11	6 48	17 13	10 48	19 42
	12	6 50	17 11	11 53	20 41
	13	6 51	17 9	12 47	21 47
	14	6 53	17 7	13 31	22 57
	15	6 55	17 4	14 6	—
				Aufg.	Unterg.
	16	6 57	17 2	0 9	14 36
	17	6 58	17 0	1 22	15 2
	18	7 0	16 58	2 33	15 25
	19	7 2	16 56	3 43	15 47

Datum		SONNE		MOND	
		Unterg.	Aufg.	Aufg.	Unterg.
		h m	h m	h m	h m
April	20	7 4	16 53	4 51	16 10
	21	7 5	16 51	5 59	16 34
	22	7 7	16 49	7 5	17 0
	23	7 9	16 47	8 9	17 30
	24	7 11	16 45	9 10	18 5
	25	7 12	16 43	10 6	18 45
	26	7 14	16 41	10 57	19 31
	27	7 16	16 39	11 42	20 24
	28	7 18	16 37	12 21	21 22
	29	7 19	16 35	12 55	22 25
	30	7 21	16 33	13 24	23 31
Mai	1	7 23	16 31	13 50	—
				Unterg.	Aufg.
	2	7 24	16 29	0 40	14 15
	3	7 26	16 27	1 53	14 39
	4	7 28	16 25	3 9	15 4
	5	7 29	16 23	4 27	15 32
	6	7 31	16 21	5 47	16 4
	7	7 33	16 19	7 8	16 42
	8	7 34	16 18	8 26	17 29
	9	7 36	16 16	9 37	18 26
	10	7 38	16 14	10 38	19 32
	11	7 39	16 12	11 27	20 44
	12	7 41	16 11	12 7	21 58
	13	7 42	16 9	12 39	23 12
	14	7 44	16 8	13 7	—
				Aufg.	Unterg.
	15	7 46	16 6	0 24	13 31
	16	7 47	16 5	1 34	13 54
	17	7 49	16 3	2 43	14 16
	18	7 50	16 2	3 50	14 39
	19	7 52	16 0	4 56	15 4
	20	7 53	15 59	6 0	15 32
	21	7 55	15 57	7 2	16 5
	22	7 56	15 56	8 0	16 43
	23	7 58	15 55	8 53	17 27
	24	7 59	15 54	9 40	18 18
	25	8 0	15 52	10 21	19 14
	26	8 2	15 51	10 56	20 15

Meridian und Polhöhe von Berlin.

Datum		SONNE		MOND	
		Unterg.	Aufg.	Aufg.	Unterg.
		h m	h m	h m	h m
Mai	27	8 3	15 50	11 26	21 19
	28	8 4	15 49	11 53	22 26
	29	8 6	15 48	12 18	23 35
	30	8 7	15 47	12 41	—
				Unterg.	Aufg.
	31	8 8	15 46	0 47	13 5
Juni	1	8 9	15 45	2 2	13 31
	2	8 10	15 45	3 19	13 59
	3	8 12	15 44	4 38	14 33
	4	8 13	15 43	5 57	15 15
	5	8 14	15 42	7 13	16 7
	6	8 15	15 42	8 21	17 9
	7	8 15	15 41	9 17	18 20
	8	8 16	15 41	10 3	19 36
	9	8 17	15 40	10 40	20 53
	10	8 18	15 40	11 10	22 9
	11	8 19	15 39	11 36	23 22
	12	8 20	15 39	11 59	—
				Aufg.	Unterg.
	13	8 20	15 39	0 33	12 22
	14	8 21	15 39	1 41	12 45
	15	8 21	15 39	2 47	13 9
	16	8 22	15 39	3 52	13 36
	17	8 22	15 39	4 55	14 7
	18	8 23	15 39	5 54	14 42
	19	8 23	15 39	6 49	15 24
	20	8 24	15 39	7 39	16 13
	21	8 24	15 39	8 22	17 8
	22	8 24	15 39	8 59	18 7
	23	8 24	15 39	9 31	19 10
	24	8 24	15 40	9 59	20 16
	25	8 24	15 40	10 24	21 24
	26	8 24	15 40	10 47	22 34
	27	8 24	15 41	11 10	23 45
	28	8 24	15 41	11 34	—
				Unterg.	Aufg.
	29	8 24	15 42	0 59	12 0
	30	8 24	15 43	2 15	12 30

Datum		SONNE		MOND	
		Unterg.	Aufg.	Unterg.	Aufg.
		h m	h m	h m	h m
Juli	1	8 24	15 43	3 32	13 7
	2	8 23	15 44	4 47	13 52
	3	8 23	15 45	5 59	14 48
	4	8 23	15 46	7 1	15 54
	5	8 22	15 46	7 53	17 9
	6	8 22	15 47	8 35	18 27
	7	8 21	15 48	9 9	19 45
	8	8 21	15 49	9 38	21 2
	9	8 20	15 50	10 3	22 16
	10	8 19	15 51	10 27	23 27
	11	8 18	15 52	10 50	—
				Aufg.	Unterg.
	12	8 17	15 53	0 35	11 14
	13	8 17	15 55	1 41	11 40
	14	8 16	15 56	2 45	12 9
	15	8 15	15 57	3 46	12 43
	16	8 14	15 58	4 42	13 23
	17	8 13	16 0	5 34	14 9
	18	8 11	16 1	6 20	15 1
	19	8 10	16 2	7 0	15 59
	20	8 9	16 4	7 34	17 1
	21	8 8	16 5	8 4	18 7
	22	8 6	16 6	8 30	19 15
	23	8 5	16 8	8 54	20 25
	24	8 4	16 9	9 17	21 36
	25	8 2	16 11	9 41	22 48
	26	8 1	16 12	10 6	—
				Unterg.	Aufg.
	27	7 59	16 14	0 1	10 33
	28	7 58	16 15	1 16	11 6
	29	7 56	16 17	2 30	11 46
	30	7 55	16 18	3 40	12 35
	31	7 53	16 20	4 45	13 35
Aug.	1	7 51	16 21	5 41	14 44
	2	7 50	16 23	6 27	15 59
	3	7 48	16 24	7 5	17 17
	4	7 46	16 26	7 37	18 36
	5	7 45	16 28	8 5	19 53
	6	7 43	16 29	8 30	21 6

Meridian und Polhöhe von Berlin.

Datum	SONNE Unterg.	SONNE Aufg.	MOND Unterg.	MOND Aufg.
	h m	h m	h m	h m
Aug. 7	7 41	16 31	8 54	22 17
8	7 39	16 32	9 18	23 26
9	7 37	16 34	9 44	—
			Aufg.	Unterg.
10	7 35	16 36	0 32	10 12
11	7 33	16 37	1 35	10 44
12	7 31	16 39	2 33	11 22
13	7 29	16 41	3 27	12 5
14	7 27	16 42	4 15	12 54
15	7 25	16 44	4 57	13 50
16	7 23	16 46	5 34	14 51
17	7 21	16 47	6 6	15 56
18	7 19	16 49	6 34	17 4
19	7 17	16 51	6 59	18 14
20	7 15	16 52	7 23	19 25
21	7 13	16 54	7 47	20 37
22	7 11	16 56	8 12	21 51
23	7 9	16 57	8 39	23 5
24	7 6	16 59	9 10	—
			Unterg.	Aufg.
25	7 4	17 1	0 18	9 47
26	7 2	17 2	1 29	10 32
27	7 0	17 4	2 34	11 26
28	6 58	17 6	3 32	12 29
29	6 55	17 7	4 21	13 40
30	6 53	17 9	5 1	14 55
31	6 51	17 11	5 35	16 12
Sept. 1	6 49	17 12	6 4	17 28
2	6 46	17 14	6 30	18 43
3	6 44	17 16	6 55	19 56
4	6 42	17 17	7 20	21 7
5	6 39	17 19	7 45	22 15
6	6 37	17 21	8 13	23 20
7	6 35	17 22	8 44	—
			Aufg.	Unterg.
8	6 32	17 24	0 21	9 19
9	6 30	17 26	1 17	10 0
10	6 28	17 27	2 7	10 47
11	6 25	17 29	2 52	11 40

Datum	SONNE Unterg.	SONNE Aufg.	MOND Aufg.	MOND Unterg.
	h m	h m	h m	h m
Sept. 12	6 23	17 31	3 31	12 39
13	6 21	17 32	4 5	13 42
14	6 18	17 34	4 34	14 48
15	6 16	17 36	5 1	15 57
16	6 13	17 37	5 26	17 8
17	6 11	17 39	5 50	18 22
18	6 9	17 41	6 15	19 37
19	6 6	17 42	6 43	20 52
20	6 4	17 44	7 13	22 7
21	6 1	17 46	7 48	23 20
22	5 59	17 47	8 31	—
			Unterg.	Aufg.
23	5 57	17 49	0 27	9 22
24	5 54	17 51	1 27	10 22
25	5 52	17 53	2 18	11 29
26	5 50	17 54	3 0	12 41
27	5 47	17 56	3 35	13 55
28	5 45	17 58	4 5	15 10
29	5 43	17 59	4 32	16 24
30	5 40	18 1	4 57	17 37
Oct. 1	5 38	18 3	5 21	18 48
2	5 36	18 4	5 46	19 57
3	5 33	18 6	6 13	21 4
4	5 31	18 8	6 43	22 7
5	5 29	18 9	7 17	23 6
6	5 26	18 11	7 56	23 59
7	5 24	18 13	8 41	—
			Aufg.	Unterg.
8	5 22	18 15	0 46	9 31
9	5 19	18 16	1 27	10 26
10	5 17	18 18	2 2	11 26
11	5 15	18 20	2 33	12 30
12	5 12	18 22	3 1	13 37
13	5 10	18 24	3 26	14 47
14	5 8	18 25	3 51	15 59
15	5 6	18 27	4 16	17 14
16	5 3	18 29	4 42	18 31
17	5 1	18 31	5 12	19 49
18	4 59	18 33	5 46	21 5
19	4 57	18 34	6 27	22 17

Meridian und Polhöhe von Berlin.

Datum		SONNE Unterg.	SONNE Aufg.	MOND Aufg.	MOND Unterg.
		h m	h m	h m	h m
Oct.	20	4 55	18 36	7 17	23 21
	21	4 53	18 38	8 15	—
				Unterg.	Aufg.
	22	4 51	18 40	0 15	9 21
	23	4 48	18 42	1 0	10 32
	24	4 46	18 43	1 37	11 45
	25	4 44	18 45	2 8	12 59
	26	4 42	18 47	2 36	14 12
	27	4 40	18 49	3 1	15 24
	28	4 38	18 51	3 25	16 34
	29	4 36	18 53	3 49	17 43
	30	4 34	18 55	4 15	18 50
	31	4 32	18 56	4 43	19 55
Nov.	1	4 30	18 58	5 15	20 56
	2	4 28	19 0	5 52	21 51
	3	4 26	19 2	6 34	22 40
	4	4 25	19 4	7 22	23 23
	5	4 23	19 6	8 16	—
				Aufg.	Unterg.
	6	4 21	19 8	0 1	9 14
	7	4 19	19 10	0 33	10 15
	8	4 17	19 11	1 1	11 20
	9	4 16	19 13	1 27	12 27
	10	4 14	19 15	1 51	13 36
	11	4 12	19 17	2 15	14 48
	12	4 11	19 19	2 40	16 3
	13	4 9	19 20	3 8	17 21
	14	4 8	19 22	3 40	18 39
	15	4 6	19 24	4 18	19 55
	16	4 5	19 26	5 4	21 6
	17	4 3	19 28	6 1	22 7
	18	4 2	19 29	7 7	22 57
	19	4 1	19 31	8 19	23 38
	20	3 59	19 33	9 34	—
				Unterg.	Aufg.
	21	3 58	19 35	0 12	10 49
	22	3 57	19 36	0 41	12 3
	23	3 56	19 38	1 6	13 15
	24	3 55	19 40	1 30	14 25

Datum		SONNE Unterg.	SONNE Aufg.	MOND Unterg.	MOND Aufg.
		h m	h m	h m	h m
Nov.	25	3 54	19 42	1 54	15 33
	26	3 53	19 43	2 19	16 40
	27	3 52	19 45	2 46	17 45
	28	3 51	19 46	3 16	18 47
	29	3 50	19 48	3 50	19 44
	30	3 49	19 49	4 30	20 36
Dec.	1	3 48	19 51	5 16	21 22
	2	3 48	19 52	6 8	22 1
	3	3 47	19 53	7 4	22 35
	4	3 46	19 55	8 4	23 5
	5	3 46	19 56	9 7	23 31
	6	3 45	19 57	10 12	23 55
	7	3 45	19 59	11 18	—
				Aufg.	Unterg.
	8	3 44	20 0	0 18	12 27
	9	3 44	20 1	0 42	13 38
	10	3 44	20 2	1 7	14 52
	11	3 44	20 3	1 35	16 9
	12	3 44	20 4	2 9	17 26
	13	3 44	20 5	2 50	18 40
	14	3 44	20 6	3 41	19 48
	15	3 44	20 7	4 43	20 46
	16	3 44	20 8	5 54	21 33
	17	3 44	20 9	7 11	22 12
	18	3 44	20 9	8 30	22 44
	19	3 44	20 10	9 47	23 11
	20	3 45	20 11	11 2	23 36
	21	3 45	20 11	12 14	—
				Unterg.	Aufg.
	22	3 45	20 12	0 0	13 24
	23	3 46	20 12	0 28	14 32
	24	3 47	20 12	0 51	15 37
	25	3 47	20 13	1 19	16 40
	26	3 48	20 13	1 52	17 39
	27	3 49	20 13	2 30	18 32
	28	3 49	20 13	3 13	19 20
	29	3 50	20 14	4 2	20 2
	30	3 51	20 14	4 57	20 38
	31	3 52	20 14	5 56	21 9

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Jan. 0	18 35 34.22	+7 4.59	−24 52 44.6	+ 2 36.9	0.158617	23 59	3 36
1	18 42 38.81	7 5.64	24 50 7.7	4 4.7	0.158066	0 2	3 37
2	18 49 44.45	7 6.56	24 46 3.0	5 33.6	0.157338	0 5	3 37
3	18 56 51.01	7 7.35	24 40 29.4	7 3.6	0.156430	0 8	3 38
4	19 3 58.36	+7 7.99	24 33 25.8	+ 8 34.3	0.155336	0 11	3 39
5	19 11 6.35	7 8.48	−24 24 51.5	10 6.0	0.154053	0 15	3 40
6	19 18 14.83	7 8.81	24 14 45.5	11 38.4	0.152574	0 18	3 41
7	19 25 23.64	7 8.95	24 3 7.1	13 11.5	0.150892	0 21	3 43
8	19 32 32.59	7 8.92	23 49 55.6	14 45.1	0.149002	0 24	3 44
9	19 39 41.51	+7 8.67	23 35 10.5	+16 19.4	0.146894	0 27	3 46
10	19 46 50.18	7 8.20	−23 18 51.1	17 53.9	0.144559	0 31	3 48
11	19 53 58.38	7 7.48	23 0 57.2	19 28.6	0.141987	0 34	3 50
12	20 1 5.86	7 6.51	22 41 28.6	21 3.3	0.139169	0 37	3 53
13	20 8 12.37	7 5.23	22 20 25.3	22 37.8	0.136090	0 40	3 55
14	20 15 17.60	+7 3.63	21 57 47.5	+24 11.8	0.132739	0 43	3 58
15	20 22 21.23	7 1.65	−21 33 35.7	25 45.1	0.129100	0 46	4 1
16	20 29 22.88	6 59.28	21 7 50.6	27 17.3	0.125159	0 49	4 4
17	20 36 22.16	6 56.43	20 40 33.3	28 47.9	0.120898	0 53	4 7
18	20 43 18.59	6 53.05	20 11 45.4	30 16.5	0.116299	0 56	4 10
19	20 50 11.64	+6 49.09	19 41 28.9	+31 42.4	0.111342	0 59	4 13
20	20 57 0.73	6 44.44	−19 9 46.5	33 5.1	0.106008	1 1	4 17
21	21 3 45.17	6 39.03	18 36 41.4	34 23.6	0.100274	1 4	4 20
22	21 10 24.20	6 32.72	18 2 17.8	35 37.1	0.094117	1 7	4 24
23	21 16 56.92	6 25.42	17 26 40.7	36 44.5	0.087516	1 10	4 27
24	21 23 22.34	+6 16.97	16 49 56.2	+37 44.6	0.080446	1 12	4 31
25	21 29 39.31	6 7.24	−16 12 11.6	38 35.7	0.072884	1 14	4 35
26	21 35 46.55	5 56.02	15 33 35.9	39 16.6	0.064807	1 17	4 39
27	21 41 42.57	5 43.18	14 54 19.3	39 45.6	0.056197	1 19	4 43
28	21 47 25.75	5 28.50	14 14 33.7	40 0.5	0.047035	1 20	4 47
29	21 52 54.25	+5 11.81	13 34 33.2	+39 59.4	0.037309	1 22	4 51
30	21 58 6.06	4 52.93	−12 54 33.8	39 40.6	0.027012	1 23	4 54
31	22 2 58.99	4 31.67	12 14 53.2	39 1.6	0.016144	1 24	4 58
Febr. 1	22 7 30.66	4 7.93	11 35 51.6	38 0.6	0.004717	1 25	5 2
2	22 11 38.59	3 41.59	10 57 51.0	36 35.9	9.992753	1 25	5 5
3	22 15 20.18	+3 12.63	10 21 15.1	+34 46.0	9.980289	1 25	5 9
4	22 18 32.81	2 41.14	− 9 46 29.1	32 30.0	9.967378	1 24	5 12
5	22 21 13.95	2 7.21	9 13 59.1	29 47.5	9.954090	1 23	5 15
6	22 23 21.16	1 31.14	8 44 11.6	26 38.5	9.940516	1 21	5 18
7	22 24 52.30	0 53.33	8 17 33.1	23 4.6	9.926766	1 18	5 20
8	22 25 45.63		7 54 28.5		9.912972	1 15	5 22

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR. h m s	Diff. m s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tag-bogen h m
Febr. 7	22 24 52.30	+0 53.33	− 8 17 33.1	+23 4.6	9.926766	1 18	5 20
8	22 25 45.63	+0 14.29	7 54 28.5	19 7.7	9.912972	1 15	5 22
9	22 25 59.92	−0 25.28	7 35 20.8	14 51.2	9.899282	1 12	5 24
10	22 25 34.64	1 4.58	7 20 29.6	10 19.3	9.885862	1 7	5 25
11	22 24 30.06	−1 42.69	7 10 10.3	+ 5 37.7	9.872894	1 2	5 26
12	22 22 47.37	2 18.58	− 7 4 32.6	+ 0 52.6	9.860562	0 57	5 26
13	22 20 28.79	2 51.23	7 3 40.0	− 3 48.5	9.849056	0 50	5 27
14	22 17 37.56	3 19.62	7 7 28.5	8 18.2	9.838557	0 43	5 26
15	22 14 17.94	3 42.88	7 15 46.7	12 28.7	9.829232	0 36	5 25
16	22 10 35.06	−4 0.23	7 28 15.4	−16 13.0	9.821222	0 29	5 24
17	22 6 34.83	4 11.27	− 7 44 28.4	19 25.4	9.814640	0 21	5 23
18	22 2 23.56	4 15.75	8 3 53.8	22 1.6	9.809556	0 12	5 21
19	21 58 7.81	4 13.79	8 25 55.4	23 59.1	9.806004	0 4	5 19
20	21 53 54.02	4 5.81	8 49 54.5	25 17.8	9.803974	23 56	5 17
21	21 49 48.21	−3 52.41	9 15 12.3	−25 59.0	9.803417	23 48	5 15
22	21 45 55.80	3 34.38	− 9 41 11.3	26 5.7	9.804253	23 40	5 12
23	21 42 21.42	3 12.61	10 7 17.0	25 41.8	9.806372	23 33	5 10
24	21 39 8.81	2 48.02	10 32 58.8	24 52.1	9.809648	23 26	5 8
25	21 36 20.79	2 21.47	10 57 50.9	23 40.9	9.813946	23 19	5 5
26	21 33 59.32	−1 53.76	11 21 31.8	−22 12.9	9.819124	23 13	5 3
27	21 32 5.56	1 25.57	−11 43 44.7	20 32.3	9.825044	23 7	5 1
28	21 30 39.99	0 57.45	12 4 17.0	18 42.4	9.831578	23 1	4 59
März 1	21 29 42.54	0 29.89	12 22 59.4	16 46.4	9.838604	22 56	4 57
2	21 29 12.65	−0 3.20	12 39 45.8	14 46.5	9.846013	22 52	4 56
3	21 29 9.45	+0 22.38	12 54 32.3	−12 44.8	9.853711	22 48	4 54
4	21 29 31.83	0 46.67	−13 7 17.1	10 42.5	9.861613	22 44	4 53
5	21 30 18.50	1 9.62	13 17 59.6	8 40.9	9.869649	22 41	4 52
6	21 31 28.12	1 31.15	13 26 40.5	6 40.4	9.877758	22 38	4 51
7	21 32 59.27	1 51.26	13 33 20.9	4 41.8	9.885890	22 36	4 51
8	21 34 50.53	+2 9.99	13 38 2.7	− 2 45.5	9.894004	22 34	4 51
9	21 37 0.52	2 27.39	−13 40 48.2	− 0 51.4	9.902065	22 32	4 50
10	21 39 27.91	2 43.53	13 41 39.6	+ 1 0.0	9.910048	22 31	4 50
11	21 42 11.44	2 58.47	13 40 39.6	2 49.1	9.917931	22 29	4 50
12	21 45 9.91	3 12.28	13 37 50.5	4 35.6	9.925697	22 28	4 50
13	21 48 22.19	+3 25.06	13 33 14.9	+ 6 19.6	9.933333	22 28	4 51
14	21 51 47.25	3 36.88	−13 26 55.3	8 1.4	9.940832	22 27	4 51
15	21 55 24.13	3 47.81	13 18 53.9	9 40.9	9.948184	22 27	4 52
16	21 59 11.94	3 57.93	13 9 13.0	11 18.3	9.955388	22 27	4 53
17	22 3 9.87	4 7.31	12 57 54.7	12 53.5	9.962440	22 27	4 54
18	22 7 17.18		12 45 1.2		9.969339	22 27	4 55

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tagbogen
	h m s	m s	° ′ ″	′ ″		h m	h m
März 17	22 3 9.87	+4 7.31	−12 57 54.7	+12 53.5	9.962440	22 27	4 54
18	22 7 17.18	4 16.02	12 45 1.2	14 26.8	9.969339	22 27	4 55
19	22 11 33.20	4 24.14	12 30 34.4	15 58.3	9.976085	22 27	4 57
20	22 15 57.34	4 31.69	12 14 36.1	17 28.0	9.982678	22 28	4 58
21	22 20 29.03	+4 38.73	11 57 8.1	+18 55.9	9.989120	22 28	5 0
22	22 25 7.76	4 45.34	−11 38 12.2	20 22.2	9.995414	22 29	5 2
23	22 29 53.10	4 51.56	11 17 50.0	21 47.1	0.001562	22 30	5 3
24	22 34 44.66	4 57.42	10 56 2.9	23 10.4	0.007566	22 31	5 5
25	22 39 42.08	5 2.97	10 32 52.5	24 32.3	0.013428	22 32	5 8
26	22 44 45.05	+5 8.24	10 8 20.2	+25 52.7	0.019151	22 33	5 10
27	22 49 53.29	5 13.29	− 9 42 27.5	27 12.0	0.024738	22 34	5 12
28	22 55 6.58	5 18.13	9 15 15.5	28 29.7	0.030191	22 35	5 15
29	23 0 24.71	5 22.80	8 46 45.8	29 46.3	0.035512	22 37	5 17
30	23 5 47.51	5 27.34	8 16 59.5	31 1.7	0.040703	22 38	5 20
31	23 11 14.85	+5 31.77	7 45 57.8	+32 15.8	0.045766	22 40	5 23
April 1	23 16 46.62	5 36.12	− 7 13 42.0	33 28.7	0.050702	22 41	5 26
2	23 22 22.74	5 40.43	6 40 13.3	34 40.5	0.055513	22 43	5 29
3	23 28 3.17	5 44.70	6 5 32.8	35 51.0	0.060198	22 45	5 32
4	23 33 47.87	5 48.97	5 29 41.8	37 0.3	0.064759	22 46	5 35
5	23 39 36.84	+5 53.27	4 52 41.5	+38 8.4	0.069194	22 48	5 38
6	23 45 30.11	5 57.61	− 4 14 33.1	39 15.2	0.073503	22 50	5 42
7	23 51 27.72	6 2.03	3 35 17.9	40 20.8	0.077684	22 52	5 45
8	23 57 29.75	6 6.53	2 54 57.1	41 24.9	0.081734	22 54	5 48
9	0 3 36.28	6 11.14	2 13 32.2	42 27.6	0.085651	22 56	5 52
10	0 9 47.42	+6 15.88	1 31 4.6	+43 28.8	0.089431	22 59	5 56
11	0 16 3.30	6 20.77	− 0 47 35.8	44 28.2	0.093070	23 1	6 0
12	0 22 24.07	6 25.83	− 0 3 7.6	45 25.8	0.096561	23 3	6 3
13	0 28 49.90	6 31.05	+ 0 42 18.2	46 21.5	0.099899	23 6	6 7
14	0 35 20.95	6 36.49	1 28 39.7	47 14.8	0.103076	23 9	6 11
15	0 41 57.44	+6 42.12	2 15 54.5	+48 5.8	0.106082	23 11	6 15
16	0 48 39.56	6 47.96	+ 3 4 0.3	48 53.8	0.108909	23 14	6 20
17	0 55 27.52	6 54.01	3 52 54.1	49 38.7	0.111544	23 17	6 24
18	1 2 21.53	7 0.28	4 42 32.8	50 20.0	0.113974	23 20	6 28
19	1 9 21.81	7 6.73	5 32 52.8	50 57.0	0.116186	23 23	6 33
20	1 16 28.54	+7 13.37	6 23 49.8	+51 29.6	0.118163	23 26	6 37
21	1 23 41.91	7 20.17	+ 7 15 19.4	51 56.6	0.119888	23 29	6 42
22	1 31 2.08	7 27.08	8 7 16.0	52 17.8	0.121343	23 33	6 46
23	1 38 29.16	7 34.06	8 59 33.8	52 32.0	0.122507	23 36	6 51
24	1 46 3.22	7 41.04	9 52 5.8	52 38.8	0.123359	23 40	6 56
25	1 53 44.26		10 44 44.6		0.123877	23 44	7 1

Wahrer geocentrischer Ort.

0h Mittl. Zeit		AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
		h m s	m s	° ′ ″	′ ″		h m	h m
April	24	1 46 3.22	+7 41.04	+ 9 52 5.8	+52 38.8	0.123359	23 40	6 56
	25	1 53 44.26	7 47.96	10 44 44.6	52 36.9	0.123877	23 44	7 1
	26	2 1 32.22	7 54.72	11 37 21.5	52 25.8	0.124038	23 47	7 6
	27	2 9 26.94	8 1.21	12 29 47.3	52 4.5	0.123819	23 51	7 11
	28	2 17 28.15	+8 7.35	13 21 51.8	+51 32.2	0.123197	23 55	7 16
	29	2 25 35.50	8 12.97	+14 13 24.0	50 48.3	0.122150	0 0	7 21
	30	2 33 48.47	8 17.96	15 4 12.3	49 52.1	0.120658	0 4	7 26
Mai	1	2 42 6.43	8 22.22	15 54 4.4	48 43.5	0.118704	0 8	7 31
	2	2 50 28.65	8 25.57	16 42 47.9	47 22.4	0.116272	0 13	7 36
	3	2 58 54.22	+8 27.93	17 30 10.3	+45 48.9	0.113351	0 17	7 41
	4	3 7 22.15	8 29.18	+18 15 59.2	44 3.7	0.109935	0 22	7 46
	5	3 15 51.33	8 29.27	19 0 2.9	42 7.6	0.106023	0 26	7 51
	6	3 24 20.60	8 28.14	19 42 10.5	40 1.6	0.101616	0 31	7 56
	7	3 32 48.74	8 25.76	20 22 12.1	37 47.1	0.096722	0 35	8 0
	8	3 41 14.50	+8 22.11	20 59 59.2	+35 25.8	0.091355	0 40	8 5
	9	3 49 36.61	8 17.24	+21 35 25.0	32 58.8	0.085529	0 44	8 9
	10	3 57 53.85	8 11.19	22 8 23.8	30 28.2	0.079266	0 49	8 13
	11	4 6 5.04	8 4.03	22 38 52.0	27 55.0	0.072587	0 53	8 16
	12	4 14 9.07	7 55.82	23 6 47.0	25 21.4	0.065517	0 57	8 20
	13	4 22 4.89	+7 46.63	23 32 8.4	+22 48.0	0.058083	1 1	8 23
	14	4 29 51.52	7 36.57	+23 54 56.4	20 16.3	0.050311	1 5	8 26
	15	4 37 28.09	7 25.68	24 15 12.7	17 47.3	0.042227	1 9	8 29
	16	4 44 53.77	7 14.06	24 33 0.0	15 22.0	0.033859	1 12	8 31
	17	4 52 7.83	7 1.77	24 48 22.0	13 0.6	0.025232	1 15	8 33
	18	4 59 9.60	+6 48.86	25 1 22.6	+10 44.1	0.016370	1 18	8 35
	19	5 5 58.46	6 35.38	+25 12 6.7	8 32.7	0.007298	1 21	8 37
	20	5 12 33.84	6 21.38	25 20 39.4	6 26.7	9.998037	1 24	8 38
	21	5 18 55.22	6 6.89	25 27 6.1	4 26.4	9.988610	1 26	8 39
	22	5 25 2.11	5 51.95	25 31 32.5	2 31.8	9.979037	1 28	8 39
	23	5 30 54.06	+5 36.57	25 34 4.3	+ 0 43.0	9.969338	1 30	8 40
	24	5 36 30.63	5 20.76	+25 34 47.3	− 1 0.1	9.959533	1 32	8 40
	25	5 41 51.39	5 4.54	25 33 47.2	2 37.1	9.949640	1 33	8 40
	26	5 46 55.93	4 47.93	25 31 10.1	4 8.5	9.939678	1 35	8 39
	27	5 51 43.86	4 30.93	25 27 1.6	5 34.3	9.929665	1 35	8 39
	28	5 56 14.79	+4 13.54	25 21 27.3	− 6 54.3	9.919622	1 36	8 38
	29	6 0 28.33	3 55.76	+25 14 33.0	8 8.8	9.909567	1 36	8 37
	30	6 4 24.09	3 37.61	25 6 24.2	9 17.9	9.899521	1 36	8 36
	31	6 8 1.70	3 19.12	24 57 6.3	10 21.6	9.889505	1 36	8 35
Juni	1	6 11 20.82	3 0.24	24 46 44.7	11 20.0	9.879543	1 35	8 33
	2	6 14 21.06		24 35 24.7		9.869658	1 34	8 32

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Juni 1	6 11 20.82	+3 0.24	+24 46 44.7	−11 20.0	9.879543	1 35	8 33
2	6 14 21.06	2 41.07	24 35 24.7	12 13.3	9.869658	1 34	8 32
3	6 17 2.13	2 21.57	24 23 11.4	13 1.4	9.859876	1 33	8 30
4	6 19 23.70	2 1.81	24 10 10.0	13 44.4	9.850227	1 32	8 28
5	6 21 25.51	+1 41.83	23 56 25.6	−14 22.3	9.840740	1 30	8 26
6	6 23 7.34	1 21.67	+23 42 3.3	14 55.3	9.831449	1 27	8 25
7	6 24 29.01	1 1.44	23 27 8.0	15 23.2	9.822390	1 25	8 23
8	6 25 30.45	0 41.22	23 11 44.8	15 46.0	9.813601	1 22	8 21
9	6 26 11.67	0 21.12	22 55 58.8	16 3.7	9.805124	1 19	8 19
10	6 26 32.79	+0 1.26	22 39 55.1	−16 16.3	9.797002	1 15	8 17
11	6 26 34.05	−0 18.18	+22 23 38.8	16 23.6	9.789282	1 11	8 15
12	6 26 15.87	0 37.03	22 7 15.2	16 25.4	9.782014	1 7	8 13
13	6 25 38.84	0 55.12	21 50 49.8	16 21.6	9.775246	1 2	8 11
14	6 24 43.72	1 12.23	21 34 28.2	16 12.2	9.769031	0 57	8 9
15	6 23 31.49	−1 28.13	21 18 16.0	−15 56.8	9.763420	0 52	8 7
16	6 22 3.36	1 42.61	+21 2 19.2	15 35.1	9.758463	0 47	8 5
17	6 20 20.75	1 55.46	20 46 44.1	15 7.0	9.754208	0 41	8 3
18	6 18 25.29	2 6.46	20 31 37.1	14 32.4	9.750701	0 35	8 1
19	6 16 18.83	2 15.42	20 17 4.7	13 51.3	9.747983	0 29	8 0
20	6 14 3.41	−2 22.18	20 3 13.4	−13 3.5	9.746089	0 23	7 58
21	6 11 41.23	2 26.59	+19 50 9.9	12 9.1	9.745047	0 17	7 57
22	6 9 14.64	2 28.58	19 38 0.8	11 8.4	9.744878	0 10	7 55
23	6 6 46.06	2 28.10	19 26 52.4	10 1.5	9.745594	0 4	7 54
24	6 4 17.96	2 25.14	19 16 50.9	8 49.3	9.747198	23 58	7 53
25	6 1 52.82	−2 19.76	19 8 1.6	− 7 32.1	9.749686	23 51	7 52
26	5 59 33.06	2 12.06	+19 0 29.5	6 10.7	9.753041	23 45	7 51
27	5 57 21.00	2 2.14	18 54 18.8	4 45.9	9.757240	23 39	7 50
28	5 55 18.86	1 50.19	18 49 32.9	3 18.8	9.762254	23 33	7 50
29	5 53 28.67	1 36.39	18 46 14.1	1 50.4	9.768044	23 27	7 50
30	5 51 52.28	−1 20.94	18 44 23.7	− 0 21.5	9.774566	23 22	7 49
Juli 1	5 50 31.34	1 4.03	+18 44 2.2	+ 1 6.7	9.781773	23 16	7 49
2	5 49 27.31	0 45.89	18 45 8.9	2 32.9	9.789615	23 11	7 49
3	5 48 41.42	0 26.71	18 47 41.8	3 56.5	9.798037	23 7	7 50
4	5 48 14.71	−0 6.66	18 51 38.3	5 16.4	9.806987	23 2	7 50
5	5 48 8.05	+0 14.09	18 56 54.7	+ 6 31.9	9.816410	22 58	7 51
6	5 48 22.14	0 35.35	+19 3 26.6	7 42.1	9.826253	22 54	7 51
7	5 48 57.49	0 57.04	19 11 8.7	8 46.3	9.836464	22 51	7 52
8	5 49 54.53	1 19.03	19 19 55.0	9 43.8	9.846993	22 48	7 53
9	5 51 13.56	1 41.24	19 29 38.8	10 34.1	9.857791	22 45	7 54
10	5 52 54.80		19 40 12.9		9.868812	22 43	7 56

Wahrer geocentrischer Ort.

0ʰ Mittl. Zeit		AR. h m s	Diff. m s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tag-bogen h m
Juli	9	5 51 13.56	+1 41.24	+19 29 38.8	+10 34.1	9.857791	22 45	7 54
	10	5 52 54.80	2 3.56	19 40 12.9	11 16.7	9.868812	22 43	7 56
	11	5 54 58.36	2 25.96	19 51 29.6	11 50.9	9.880012	22 41	7 57
	12	5 57 24.32	2 48.36	20 3 20.5	12 16.4	9.891349	22 40	7 58
	13	6 0 12.68	+3 10.74	20 15 36.9	+12 32.8	9.902782	22 39	8 0
	14	6 3 23.42	3 33.03	+20 28 9.7	12 39.4	9.914271	22 38	8 1
	15	6 6 56.45	3 55.20	20 40 49.1	12 36.1	9.925780	22 37	8 2
	16	6 10 51.65	4 17.23	20 53 25.2	12 22.4	9.937273	22 37	8 4
	17	6 15 8.88	4 39.04	21 5 47.6	11 57.8	9.948713	22 38	8 5
	18	6 19 47.92	+5 0.58	21 17 45.4	+11 22.1	9.960067	22 39	8 7
	19	6 24 48.50	5 21.79	+21 29 7.5	10 34.8	9.971298	22 40	8 8
	20	6 30 10.29	5 42.61	21 39 42.3	9 35.8	9.982374	22 41	8 9
	21	6 35 52.90	6 2.90	21 49 18.1	8 24.9	9.993258	22 43	8 11
	22	6 41 55.80	6 22.60	21 57 43.0	7 2.0	0.003917	22 45	8 12
	23	6 48 18.40	+6 41.53	22 4 45.0	+ 5 27.2	0.014316	22 47	8 12
	24	6 54 59.93	6 59.57	+22 10 12.2	3 40.7	0.024420	22 50	8 13
	25	7 1 59.50	7 16.57	22 13 52.9	+ 1 43.1	0.034196	22 53	8 13
	26	7 9 16.07	7 32.35	22 15 36.0	− 0 24.6	0.043610	22 56	8 14
	27	7 16 48.42	7 46.75	22 15 11.4	2 42.1	0.052629	23 0	8 14
	28	7 24 35.17	+7 59.60	22 12 29.3	− 5 7.3	0.061225	23 4	8 13
	29	7 32 34.77	8 10.79	+22 7 22.0	7 39.1	0.069370	23 8	8 13
	30	7 40 45.56	8 20.19	21 59 42.9	10 15.7	0.077041	23 12	8 12
	31	7 49 5.75	8 27.72	21 49 27.2	12 55.0	0.084218	23 16	8 11
Aug.	1	7 57 33.47	8 33.35	21 36 32.2	15 35.4	0.090887	23 21	8 9
	2	8 6 6.82	+8 37.08	21 20 56.8	−18 14.4	0.097037	23 26	8 7
	3	8 14 43.90	8 38.99	+21 2 42.4	20 50.4	0.102666	23 30	8 5
	4	8 23 22.89	8 39.16	20 41 52.0	23 21.8	0.107774	23 35	8 3
	5	8 32 2.05	8 37.71	20 18 30.2	25 46.7	0.112366	23 40	8 0
	6	8 40 39.76	8 34.81	19 52 43.5	28 4.2	0.116455	23 44	7 57
	7	8 49 14.57	+8 30.65	19 24 39.3	−30 13.2	0.120054	23 49	7 54
	8	8 57 45.22	8 25.39	+18 54 26.1	32 13.2	0.123182	23 54	7 50
	9	9 6 10.61	8 19.22	18 22 12.9	34 3.7	0.125859	23 58	7 47
	10	9 14 29.83	8 12.32	17 48 9.2	35 44.6	0.128106	0 3	7 43
	11	9 22 42.15	8 4.87	17 12 24.6	37 15.9	0.129947	0 7	7 39
	12	9 30 47.02	+7 56.99	16 35 8.7	−38 37.9	0.131405	0 11	7 36
	13	9 38 44.01	7 48.83	+15 56 30.8	39 50.9	0.132503	0 15	7 32
	14	9 46 32.84	7 40.51	15 16 39.9	40 55.4	0.133264	0 19	7 27
	15	9 54 13.35	7 32.12	14 35 44.5	41 51.8	0.133708	0 22	7 23
	16	10 1 45.47	7 23.74	13 53 52.7	42 40.5	0.133856	0 26	7 19
	17	10 9 9.21		13 11 12.2		0.133728	0 30	7 15

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Aug. 16	10 1 45.47	+7 23.74	+13 53 52.7	−42 40.5	0.133856	0 26	7 19
17	10 9 9.21	7 15.44	13 11 12.2	43 22.4	0.133728	0 30	7 15
18	10 16 24.65	7 7.27	12 27 49.8	43 57.6	0.133341	0 33	7 11
19	10 23 31.92	6 59.27	11 43 52.2	44 26.8	0.132712	0 36	7 7
20	10 30 31.19	+6 51.48	10 59 25.4	−44 50.6	0.131854	0 39	7 2
21	10 37 22.67	6 43.91	+10 14 34.8	45 9.1	0.130781	0 42	6 58
22	10 44 6.58	6 36.58	9 29 25.7	45 23.1	0.129506	0 45	6 54
23	10 50 43.16	6 29.49	8 44 2.6	45 32.7	0.128039	0 47	6 50
24	10 57 12.65	6 22.66	7 58 29.9	45 38.3	0.126389	0 50	6 46
25	11 3 35.31	+6 16.08	7 12 51.6	−45 40.2	0.124565	0 52	6 42
26	11 9 51.39	6 9.74	+ 6 27 11.4	45 38.8	0.122573	0 55	6 38
27	11 16 1.13	6 3.64	5 41 32.6	45 34.2	0.120419	0 57	6 33
28	11 22 4.77	5 57.76	4 55 58.4	45 26.8	0.118109	0 59	6 29
29	11 28 2.53	5 52.11	4 10 31.6	45 16.6	0.115646	1 1	6 25
30	11 33 54.64	+5 46.66	3 25 15.0	−45 3.7	0.113034	1 3	6 22
31	11 39 41.30	5 41.38	+ 2 40 11.3	44 48.6	0.110276	1 5	6 18
Sept. 1	11 45 22.68	5 36.30	1 55 22.7	44 31.1	0.107373	1 7	6 14
2	11 50 58.98	5 31.37	1 10 51.6	44 11.4	0.104327	1 8	6 10
3	11 56 30.35	5 26.57	+ 0 26 40.2	43 49.6	0.101138	1 10	6 6
4	12 1 56.92	+5 21.90	— 0 17 9.4	−43 25.8	0.097806	1 11	6 2
5	12 7 18.82	5 17.34	— 1 0 35.2	43 0.0	0.094330	1 13	5 58
6	12 12 36.16	5 12.85	1 43 35.2	42 32.1	0.090710	1 14	5 55
7	12 17 49.01	5 8.44	2 26 7.3	42 2.5	0.086943	1 15	5 51
8	12 22 57.45	5 4.06	3 8 9.8	41 30.8	0.083029	1 17	5 47
9	12 28 1.51	+4 59.71	3 49 40.6	−40 57.3	0.078964	1 18	5 44
10	12 33 1.22	4 55.35	— 4 30 37.9	40 21.7	0.074745	1 19	5 40
11	12 37 56.57	4 50.97	5 10 59.6	39 44.1	0.070370	1 20	5 37
12	12 42 47.54	4 46.52	5 50 43.7	39 4.5	0.065835	1 21	5 33
13	12 47 34.06	4 41.98	6 29 48.2	38 22.6	0.061135	1 22	5 30
14	12 52 16.04	+4 37.32	7 8 10.8	−37 38.5	0.056266	1 22	5 26
15	12 56 53.36	4 32.51	— 7 45 49.3	36 52.0	0.051225	1 23	5 23
16	13 1 25.87	4 27.49	8 22 41.3	36 3.1	0.046005	1 23	5 19
17	13 5 53.36	4 22.25	8 58 44.4	35 11.4	0.040602	1 24	5 16
18	13 10 15.61	4 16.72	9 33 55.8	34 16.7	0.035011	1 24	5 13
19	13 14 32.33	+4 10.85	10 8 12.5	−33 19.1	0.029226	1 25	5 10
20	13 18 43.18	4 4.61	—10 41 31.6	32 18.0	0.023241	1 25	5 7
21	13 22 47.79	3 57.91	11 13 49.6	31 13.2	0.017052	1 25	5 4
22	13 26 45.70	3 50.69	11 45 2.8	30 4.4	0.010653	1 25	5 1
23	13 30 36.39	3 42.90	12 15 7.2	28 51.4	0.004039	1 25	4 58
24	13 34 19.29		12 43 58.6		9.997206	1 25	4 55

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Sept. 23	13 30 36.39	+3 42.90	−12 15 7.2	−28 51.4	0.004039	1 25	4 58
24	13 34 19.29	3 34.43	12 43 58.6	27 33.5	9.997206	1 25	4 55
25	13 37 53.72	3 25.21	13 11 32.1	26 10.1	9.990149	1 25	4 53
26	13 41 18.93	3 15.14	13 37 42.2	24 41.0	9.982867	1 24	4 50
27	13 44 34.07	+3 4.12	14 2 23.2	−23 5.3	9.975358	1 23	4 48
28	13 47 38.19	2 52.05	−14 25 28.5	21 22.3	9.967622	1 22	4 46
29	13 50 30.24	2 38.81	14 46 50.8	19 31.2	9.959662	1 21	4 44
30	13 53 9.05	2 24.29	15 6 22.0	17 31.4	9.951484	1 20	4 42
Oct. 1	13 55 33.34	2 8.37	15 23 53.4	15 21.6	9.943098	1 19	4 40
2	13 57 41.71	+1 50.95	15 39 15.0	−13 0.7	9.934518	1 17	4 38
3	13 59 32.66	1 31.92	−15 52 15.7	10 28.0	9.925764	1 15	4 37
4	14 1 4.58	1 11.22	16 2 43.7	7 42.1	9.916865	1 12	4 36
5	14 2 15.80	0 48.77	16 10 25.8	4 42.0	9.907856	1 9	4 35
6	14 3 4.57	+0 24.60	16 15 7.8	− 1 26.8	9.898784	1 6	4 35
7	14 3 29.17	−0 1.24	16 16 34.6	+ 2 4.1	9.889709	1 3	4 35
8	14 3 27.93	0 28.60	−16 14 30.5	5 51.1	9.880705	0 59	4 35
9	14 2 59.33	0 57.21	16 8 39.4	9 53.5	9.871862	0 54	4 35
10	14 2 2.12	1 26.66	15 58 45.9	14 10.2	9.863289	0 49	4 36
11	14 0 35.46	1 56.42	15 44 35.7	18 38.3	9.855114	0 44	4 38
12	13 58 39.04	−2 25.75	15 25 57.4	+23 13.3	9.847484	0 38	4 40
13	13 56 13.29	2 53.72	−15 2 44.1	27 49.1	9.840564	0 32	4 42
14	13 53 19.57	3 19.27	14 34 55.0	32 16.9	9.834535	0 25	4 45
15	13 50 0.30	3 41.24	14 2 38.1	36 26.5	9.829587	0 18	4 48
16	13 46 19.06	3 58.40	13 26 11.6	40 5.6	9.825907	0 10	4 51
17	13 42 20.66	−4 9.63	12 46 6.0	+43 1.7	9.823675	0 2	4 55
18	13 38 11.03	4 14.00	−12 3 4.3	45 2.4	9.823044	23 54	4 59
19	13 33 57.03	4 10.88	11 18 1.9	45 57.7	9.824128	23 46	5 3
20	13 29 46.15	4 0.09	10 32 4.2	45 40.8	9.826993	23 38	5 8
21	13 25 46.06	3 41.84	9 46 23.4	44 9.9	9.831643	23 30	5 12
22	13 22 4.22	−3 16.83	9 2 13.5	+41 27.7	9.838023	23 22	5 16
23	13 18 47.39	2 46.07	− 8 20 45.8	37 41.8	9.846015	23 15	5 20
24	13 16 1.32	2 10.86	7 43 4.0	33 3.3	9.855452	23 8	5 23
25	13 13 50.46	1 32.61	7 10 0.7	27 45.4	9.866129	23 2	5 26
26	13 12 17.85	0 52.70	6 42 15.3	22 2.1	9.877814	22 57	5 28
27	13 11 25.15	−0 12.42	6 20 13.2	+16 7.0	9.890270	22 52	5 30
28	13 11 12.73	+0 27.13	− 6 4 6.2	10 11.9	9.903263	22 48	5 32
29	13 11 39.86	1 5.07	5 53 54.3	+ 4 26.7	9.916573	22 44	5 33
30	13 12 44.93	1 40.76	5 49 27.6	− 1 1.0	9.930006	22 41	5 33
31	13 14 25.69	2 13.78	5 50 28.6	6 5.8	9.943390	22 39	5 33
Nov. 1	13 16 39.47		5 56 34.4		9.956586	22 37	5 33

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Oct. 31	13 14 25.69	+2 13.78	− 5 50 28.6	− 6 5.8	9.943390	22 39	5 33
Nov. 1	13 16 39.47	2 43.88	5 56 34.4	10 44.3	9.956586	22 37	5 33
2	13 19 23.35	3 11.00	6 7 18.7	14 54.7	9.969479	22 36	5 32
3	13 22 34.35	3 35.18	6 22 13.4	18 36.6	9.981982	22 35	5 30
4	13 26 9.53	+3 56.56	6 40 50.0	−21 50.6	9.994032	22 35	5 29
5	13 30 6.09	4 15.32	− 7 2 40.6	24 37.9	0.005583	22 35	5 27
6	13 34 21.41	4 31.70	7 27 18.5	27 0.3	0.016608	22 35	5 24
7	13 38 53.11	4 45.94	7 54 18.8	28 59.6	0.027093	22 36	5 22
8	13 43 39.05	4 58.29	8 23 18.4	30 38.0	0.037036	22 37	5 19
9	13 48 37.34	+5 8.98	8 53 56.4	−31 57.5	0.046441	22 38	5 17
10	13 53 46.32	5 18.22	− 9 25 53.9	33 0.2	0.055319	22 39	5 14
11	13 59 4.54	5 26.23	9 58 54.1	33 47.9	0.063686	22 40	5 11
12	14 4 30.77	5 33.17	10 32 42.0	34 22.2	0.071560	22 42	5 8
13	14 10 3.94	5 39.24	11 7 4.2	34 44.9	0.078962	22 43	5 4
14	14 15 43.18	+5 44.54	11 41 49.1	−34 57.3	0.085912	22 45	5 1
15	14 21 27.72	5 49.20	−12 16 46.4	35 0.6	0.092433	22 47	4 58
16	14 27 16.92	5 53.35	12 51 47.0	34 55.8	0.098544	22 49	4 55
17	14 33 10.27	5 57.06	13 26 42.8	34 44.2	0.104268	22 51	4 51
18	14 39 7.33	6 0.42	14 1 27.0	34 26.2	0.109623	22 53	4 48
19	14 45 7.75	+6 3.47	14 35 53.2	−34 2.8	0.114628	22 55	4 45
20	14 51 11.22	6 6.29	−15 9 56.0	33 34.5	0.119302	22 57	4 41
21	14 57 17.51	6 8.92	15 43 30.5	33 2.1	0.123660	22 59	4 38
22	15 3 26.43	6 11.40	16 16 32.6	32 25.6	0.127719	23 1	4 35
23	15 9 37.83	6 13.75	16 48 58.2	31 45.6	0.131492	23 4	4 31
24	15 15 51.58	+6 16.01	17 20 43.8	−31 2.6	0.134994	23 6	4 28
25	15 22 7.59	6 18.19	−17 51 46.4	30 16.6	0.138236	23 8	4 25
26	15 28 25.78	6 20.32	18 22 3.0	29 28.2	0.141229	23 11	4 22
27	15 34 46.10	6 22.41	18 51 31.2	28 37.3	0.143985	23 13	4 18
28	15 41 8.51	6 24.47	19 20 8.5	27 44.1	0.146513	23 15	4 15
29	15 47 32.98	+6 26.49	19 47 52.6	−26 48.9	0.148820	23 18	4 12
30	15 53 59.47	6 28.52	−20 14 41.5	25 51.7	0.150916	23 20	4 9
Dec. 1	16 0 27.99	6 30.53	20 40 33.2	24 52.7	0.152807	23 23	4 7
2	16 6 58.52	6 32.52	21 5 25.9	23 51.9	0.154499	23 26	4 4
3	16 13 31.04	6 34.51	21 29 17.8	22 49.5	0.155998	23 28	4 1
4	16 20 5.55	+6 36.48	21 52 7.3	−21 45.3	0.157309	23 31	3 58
5	16 26 42.03	6 38.46	−22 13 52.6	20 39.7	0.158436	23 33	3 56
6	16 33 20.49	6 40.41	22 34 32.3	19 32.5	0.159383	23 36	3 53
7	16 40 0.90	6 42.34	22 54 4.8	18 23.8	0.160152	23 39	3 51
8	16 46 43.24	6 44.25	23 12 28.6	17 13.6	0.160748	23 42	3 49
9	16 53 27.49		23 29 42.2		0.161170	23 44	3 47

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Dec. 8	16 46 43.24	+6 44.25	−23 12 28.6	−17 13.6	0.160748	23 42	3 49
9	16 53 27.49	6 46.14	23 29 42.2	16 1.9	0.161170	23 44	3 47
10	17 0 13.63	6 47.99	23 45 44.1	14 48.8	0.161422	23 47	3 45
11	17 7 1.62	6 49.80	24 0 32.9	13 34.3	0.161504	23 50	3 43
12	17 13 51.42	+6 51.56	24 14 7.2	−12 18.3	0.161416	23 53	3 41
13	17 20 42.98	6 53.26	−24 26 25.5	11 1.1	0.161159	23 56	3 40
14	17 27 36.24	6 54.91	24 37 26.6	9 42.4	0.160731	23 59	3 38
15	17 34 31.15	6 56.47	24 47 9.0	8 22.4	0.160131	0 2	3 37
16	17 41 27.62	6 57.95	24 55 31.4	7 1.0	0.159357	0 5	3 36
17	17 48 25.57	+6 59.34	25 2 32.4	− 5 38.4	0.158408	0 8	3 35
18	17 55 24.91	7 0.62	−25 8 10.8	4 14.4	0.157280	0 11	3 34
19	18 2 25.53	7 1.76	25 12 25.2	2 49.2	0.155969	0 14	3 34
20	18 9 27.29	7 2.78	25 15 14.4	− 1 22.7	0.154472	0 17	3 33
21	18 16 30.07	7 3.64	25 16 37.1	+ 0 4.8	0.152784	0 20	3 33
22	18 23 33.71	+7 4.32	25 16 32.3	+ 1 33.5	0.150898	0 23	3 33
23	18 30 38.03	7 4.82	−25 14 58.8	3 3.4	0.148808	0 26	3 33
24	18 37 42.85	7 5.10	25 11 55.4	4 34.0	0.146508	0 30	3 34
25	18 44 47.95	7 5.16	25 7 21.4	6 5.7	0.143990	0 33	3 34
26	18 51 53.11	7 4.96	25 1 15.7	7 38.1	0.141245	0 36	3 35
27	18 58 58.07	+7 4.47	24 53 37.6	+ 9 11.2	0.138263	0 39	3 36
28	19 6 2.54	7 3.66	−24 44 26.4	10 44.7	0.135034	0 42	3 37
29	19 13 6.20	7 2.51	24 33 41.7	12 18.6	0.131546	0 45	3 39
30	19 20 8.71	7 0.97	24 21 23.1	13 52.6	0.127788	0 48	3 40
31	19 27 9.68	6 59.00	24 7 30.5	15 26.4	0.123745	0 51	3 42
32	19 34 8.68	+6 56.53	23 52 4.1	+16 59.8	0.119403	0 54	3 44
33	19 41 5.21		−23 35 4.3		0.114745	0 57	3 46

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR. h m s	Diff. m s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tag-bogen h m
Jan. 0	21 42 29.34	+2 35.55	−14 9 25.1	+22 6.1	9.679690	3 5	4 47
1	21 45 4.89	2 30.37	13 47 19.0	22 4.9	9.673276	3 4	4 49
2	21 47 35.26	2 25.07	13 25 14.1	22 2.3	9.666806	3 3	4 51
3	21 50 0.33	2 19.62	13 3 11.8	21 58.2	9.660282	3 1	4 54
4	21 52 19.95	+2 13.99	12 41 13.6	+21 52.7	9.653706	3 0	4 56
5	21 54 33.94	2 8.21	−12 19 20.9	21 45.6	9.647079	2 58	4 58
6	21 56 42.15	2 2.25	11 57 35.3	21 36.9	9.640404	2 56	5 0
7	21 58 44.40	1 56.12	11 35 58.4	21 26.6	9.633683	2 54	5 2
8	22 0 40.52	1 49.81	11 14 31.8	21 14.6	9.626919	2 52	5 4
9	22 2 30.33	+1 43.31	10 53 17.2	+21 1.0	9.620114	2 50	5 6
10	22 4 13.64	1 36.60	−10 32 16.2	20 45.5	9.613273	2 48	5 8
11	22 5 50.24	1 29.69	10 11 30.7	20 28.2	9.606400	2 46	5 10
12	22 7 19.93	1 22.56	9 51 2.5	20 8.7	9.599501	2 43	5 11
13	22 8 42.49	1 15.20	9 30 53.8	19 47.1	9.592579	2 41	5 13
14	22 9 57.69	+1 7.61	9 11 6.7	+19 23.6	9.585643	2 38	5 15
15	22 11 5.30	0 59.84	− 8 51 43.1	18 58.1	9.578699	2 35	5 17
16	22 12 5.14	0 51.85	8 32 45.0	18 30.5	9.571753	2 32	5 19
17	22 12 56.99	0 43.63	8 14 14.5	18 0.5	9.564815	2 29	5 20
18	22 13 40.62	0 35.18	7 56 14.0	17 28.1	9.557895	2 26	5 22
19	22 14 15.80	+0 26.54	7 38 45.9	+16 53.5	9.551004	2 23	5 23
20	22 14 42.34	0 17.72	− 7 21 52.4	16 16.3	9.544152	2 19	5 25
21	22 15 0.06	+0 8.75	7 5 36.1	15 37.0	9.537353	2 15	5 26
22	22 15 8.81	−0 0.38	6 49 59.1	14 55.3	9.530620	2 12	5 28
23	22 15 8.43	0 9.62	6 35 3.8	14 10.8	9.523969	2 8	5 29
24	22 14 58.81	−0 18.95	6 20 53.0	+13 24.2	9.517414	2 4	5 30
25	22 14 39.86	0 28.32	− 6 7 28.8	12 35.3	9.510973	1 59	5 32
26	22 14 11.54	0 37.72	5 54 53.5	11 44.0	9.504664	1 55	5 33
27	22 13 33.82	0 47.12	5 43 9.5	10 50.2	9.498504	1 50	5 34
28	22 12 46.70	0 56.43	5 32 19.3	9 54.3	9.492512	1 46	5 35
29	22 11 50.27	−1 5.62	5 22 25.0	+ 8 56.6	9.486710	1 41	5 36
30	22 10 44.65	1 14.63	− 5 13 28.4	7 56.7	9.481118	1 36	5 36
31	22 9 30.02	1 23.42	5 5 31.7	6 55.1	9.475756	1 31	5 37
Febr. 1	22 8 6.60	1 31.94	4 58 36.6	5 52.0	9.470648	1 25	5 38
2	22 6 34.66	1 40.10	4 52 44.6	4 47.4	9.465816	1 20	5 38
3	22 4 54.56	−1 47.82	4 47 57.2	+ 3 41.8	9.461279	1 14	5 39
4	22 3 6.74	1 55.04	− 4 44 15.4	2 35.9	9.457061	1 8	5 39
5	22 1 11.70	2 1.73	4 41 39.5	1 29.5	9.453183	1 3	5 39
6	21 59 9.97	2 7.76	4 40 10.0	+ 0 23.0	9.449667	0 57	5 39
7	21 57 2.21	2 13.09	4 39 47.0	− 0 42.9	9.446530	0 51	5 39
8	21 54 49.12		4 40 29.9		9.443790	0 44	5 39

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Febr. 7	21 57 2.21	−2 13.09	−4 39 47.0	−0 42.9	9.446530	0 51	5 39
8	21 54 49.12	2 17.71	4 40 29.9	1 47.8	9.443790	0 44	5 39
9	21 52 31.41	2 21.49	4 42 17.7	2 51.2	9.441466	0 38	5 39
10	21 50 9.92	2 24.40	4 45 8.9	3 52.8	9.439571	0 32	5 39
11	21 47 45.52	−2 26.42	4 49 1.7	−4 52.0	9.438117	0 25	5 38
12	21 45 19.10	2 27.52	−4 53 53.7	5 48.6	9.437116	0 19	5 38
13	21 42 51.58	2 27.68	4 59 42.3	6 42.0	9.436573	0 13	5 38
14	21 40 23.90	2 26.85	5 6 24.3	7 31.8	9.436495	0 6	5 37
15	21 37 57.05	2 25.06	5 13 56.1	8 17.5	9.436882	0 0	5 36
16	21 35 31.99	−2 22.35	5 22 13.6	−8 59.0	9.437734	23 54	5 36
17	21 33 9.64	2 18.69	−5 31 12.6	9 36.0	9.439047	23 47	5 35
18	21 30 50.95	2 14.13	5 40 48.6	10 8.3	9.440815	23 41	5 34
19	21 28 36.82	2 8.74	5 50 56.9	10 35.8	9.443025	23 35	5 33
20	21 26 28.08	2 2.55	6 1 32.7	10 58.6	9.445666	23 29	5 32
21	21 24 25.53	−1 55.67	6 12 31.3	−11 16.3	9.448723	23 23	5 31
22	21 22 29.86	1 48.13	−6 23 47.6	11 29.5	9.452178	23 17	5 30
23	21 20 41.73	1 39.99	6 35 17.1	11 38.0	9.456013	23 11	5 29
24	21 19 1.74	1 31.37	6 46 55.1	11 42.2	9.460208	23 5	5 28
25	21 17 30.37	1 22.36	6 58 37.3	11 42.1	9.464738	23 0	5 27
26	21 16 8.01	−1 12.99	7 10 19.4	−11 38.0	9.469583	22 55	5 26
27	21 14 55.02	1 3.38	−7 21 57.4	11 30.2	9.474719	22 50	5 25
28	21 13 51.64	0 53.55	7 33 27.6	11 18.9	9.480123	22 45	5 24
März 1	21 12 58.09	0 43.64	7 44 46.5	11 4.6	9.485773	22 40	5 23
2	21 12 14.45	0 33.65	7 55 51.1	10 47.4	9.491647	22 35	5 22
3	21 11 40.80	−0 23.67	8 6 38.5	−10 27.5	9.497721	22 31	5 21
4	21 11 17.13	0 13.72	−8 17 6.0	10 5.2	9.503975	22 26	5 20
5	21 11 3.41	−0 3.87	8 27 11.2	9 40.9	9.510389	22 22	5 19
6	21 10 59.54	+0 5.87	8 36 52.1	9 14.8	9.516943	22 18	5 18
7	21 11 5.41	0 15.41	8 46 6.9	8 46.8	9.523618	22 14	5 17
8	21 11 20.82	+0 24.77	8 54 53.7	−8 17.2	9.530397	22 10	5 17
9	21 11 45.59	0 33.94	−9 3 10.9	7 46.4	9.537266	22 7	5 16
10	21 12 19.53	0 42.84	9 10 57.3	7 14.8	9.544209	22 4	5 15
11	21 13 2.37	0 51.51	9 18 12.1	6 42.2	9.551213	22 0	5 14
12	21 13 53.88	0 59.93	9 24 54.3	6 8.4	9.558264	21 57	5 14
13	21 14 53.81	+1 8.09	9 31 2.7	−5 34.0	9.565350	21 54	5 13
14	21 16 1.90	1 15.97	−9 36 36.7	4 59.1	9.572463	21 52	5 13
15	21 17 17.87	1 23.60	9 41 35.8	4 23.6	9.579593	21 49	5 12
16	21 18 41.47	1 30.95	9 45 59.4	3 47.5	9.586729	21 46	5 12
17	21 20 12.42	1 38.07	9 49 46.9	3 11.0	9.593865	21 44	5 12
18	21 21 50.49		9 52 57.9		9.600994	21 42	5 11

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
März 17	21 20 12.42	+1 38.07	−9 49 46.9	−3 11.0	9.593865	21 44	5 12
18	21 21 50.49	1 44.89	9 52 57.9	2 34.3	9.600994	21 42	5 11
19	21 23 35.38	1 51.50	9 55 32.2	1 57.3	9.608108	21 39	5 11
20	21 25 26.88	1 57.82	9 57 29.5	1 20.3	9.615202	21 37	5 11
21	21 27 24.70	+2 3.90	9 58 49.8	−0 43.0	9.622269	21 35	5 11
22	21 29 28.60	2 9.74	−9 59 32.8	−0 5.6	9.629305	21 33	5 11
23	21 31 38.34	2 15.34	9 59 38.4	+0 31.7	9.636305	21 32	5 11
24	21 33 53.68	2 20.71	9 59 6.7	1 9.0	9.643265	21 30	5 11
25	21 36 14.39	2 25.82	9 57 57.7	1 46.0	9.650181	21 28	5 11
26	21 38 40.21	+2 30.72	9 56 11.7	+2 23.0	9.657050	21 27	5 11
27	21 41 10.93	2 35.39	−9 53 48.7	2 59.8	9.663869	21 25	5 11
28	21 43 46.32	2 39.86	9 50 48.9	3 36.2	9.670637	21 24	5 11
29	21 46 26.18	2 44.11	9 47 12.7	4 12.4	9.677348	21 23	5 12
30	21 49 10.29	2 48.16	9 43 0.3	4 48.4	9.684002	21 22	5 12
31	21 51 58.45	+2 52.02	9 38 11.9	+5 23.9	9.690598	21 20	5 13
April 1	21 54 50.47	2 55.68	−9 32 48.0	5 58.9	9.697135	21 19	5 13
2	21 57 46.15	2 59.14	9 26 49.1	6 33.6	9.703610	21 18	5 14
3	22 0 45.29	3 2.46	9 20 15.5	7 7.8	9.710022	21 17	5 14
4	22 3 47.75	3 5.61	9 13 7.7	7 41.8	9.716372	21 16	5 15
5	22 6 53.36	+3 8.57	9 5 25.9	+8 15.0	9.722658	21 16	5 16
6	22 10 1.93	3 11.38	−8 57 10.9	8 47.9	9.728881	21 15	5 16
7	22 13 13.31	3 14.05	8 48 23.0	9 20.1	9.735040	21 14	5 17
8	22 16 27.36	3 16.56	8 39 2.9	9 52.0	9.741134	21 13	5 18
9	22 19 43.92	3 18.95	8 29 10.9	10 23.1	9.747165	21 13	5 19
10	22 23 2.87	+3 21.23	8 18 47.8	+10 53.8	9.753133	21 12	5 20
11	22 26 24.10	3 23.37	−8 7 54.0	11 24.0	9.759037	21 11	5 21
12	22 29 47.47	3 25.42	7 56 30.0	11 53.6	9.764880	21 11	5 22
13	22 33 12.89	3 27.36	7 44 36.4	12 22.8	9.770660	21 10	5 23
14	22 36 40.25	3 29.18	7 32 13.6	12 51.3	9.776380	21 10	5 24
15	22 40 9.43	+3 30.95	7 19 22.3	+13 19.3	9.782038	21 9	5 25
16	22 43 40.38	3 32.62	−7 6 3.0	13 46.8	9.787635	21 9	5 26
17	22 47 13.00	3 34.22	6 52 16.2	14 13.7	9.793173	21 9	5 28
18	22 50 47.22	3 35.76	6 38 2.5	14 40.0	9.798653	21 8	5 29
19	22 54 22.98	3 37.19	6 23 22.5	15 5.6	9.804074	21 8	5 30
20	22 58 0.17	+3 38.59	6 8 16.9	+15 30.9	9.809435	21 8	5 31
21	23 1 38.76	3 39.93	−5 52 46.0	15 55.4	9.814739	21 7	5 33
22	23 5 18.69	3 41.19	5 36 50.6	16 19.2	9.819986	21 7	5 34
23	23 8 59.88	3 42.41	5 20 31.4	16 42.6	9.825177	21 7	5 36
24	23 12 42.29	3 43.57	5 3 48.8	17 5.0	9.830311	21 7	5 37
25	23 16 25.86		4 46 43.8		9.835389	21 6	5 39

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
April 24	23 12 42.29	+3 43.57	−5 3 48.8	+17 5.0	9.830311	21 7	5 37
25	23 16 25.86	3 44.69	4 46 43.8	17 27.1	9.835389	21 6	5 39
26	23 20 10.55	3 45.76	4 29 16.7	17 48.3	9.840412	21 6	5 40
27	23 23 56.31	3 46.79	4 11 28.4	18 8.9	9.845380	21 6	5 42
28	23 27 43.10	+3 47.78	3 53 19.5	+18 28.9	9.850294	21 6	5 43
29	23 31 30.88	3 48.73	−3 34 50.6	18 48.2	9.855154	21 6	5 45
30	23 35 19.61	3 49.65	3 16 2.4	19 6.7	9.859959	21 5	5 47
Mai 1	23 39 9.26	3 50.52	2 56 55.7	19 24.6	9.864714	21 5	5 48
2	23 42 59.78	3 51.36	2 37 31.1	19 41.7	9.869414	21 5	5 50
3	23 46 51.14	+3 52.20	2 17 49.4	+19 58.1	9.874063	21 5	5 52
4	23 50 43.34	3 53.01	−1 57 51.3	20 13.9	9.878661	21 5	5 53
5	23 54 36.35	3 53.77	1 37 37.4	20 28.9	9.883208	21 5	5 55
6	23 58 30.12	3 54.52	1 17 8.5	20 43.2	9.887705	21 5	5 57
7	0 2 24.64	3 55.25	0 56 25.3	20 56.8	9.892154	21 5	5 59
8	0 6 19.89	+3 55.97	0 35 28.5	+21 9.7	9.896553	21 5	6 1
9	0 10 15.86	3 56.66	−0 14 18.8	21 21.8	9.900905	21 5	6 2
10	0 14 12.52	3 57.37	+0 7 3.0	21 33.4	9.905209	21 5	6 4
11	0 18 9.89	3 58.06	0 28 36.4	21 44.1	9.909467	21 5	6 6
12	0 22 7.95	3 58.73	0 50 20.5	21 54.3	9.913680	21 5	6 8
13	0 26 6.68	+3 59.43	1 12 14.8	+22 3.8	9.917848	21 5	6 10
14	0 30 6.11	4 0.12	+1 34 18.6	22 12.6	9.921972	21 5	6 12
15	0 34 6.23	4 0.82	1 56 31.2	22 20.7	9.926052	21 5	6 14
16	0 38 7.05	4 1.53	2 18 51.9	22 28.1	9.930090	21 5	6 16
17	0 42 8.58	4 2.23	2 41 20.0	22 35.0	9.934085	21 5	6 18
18	0 46 10.81	+4 2.95	3 3 55.0	+22 41.0	9.938039	21 5	6 20
19	0 50 13.76	4 3.70	+3 26 36.0	22 46.5	9.941952	21 5	6 22
20	0 54 17.46	4 4.44	3 49 22.5	22 51.1	9.945823	21 6	6 24
21	0 58 21.90	4 5.19	4 12 13.6	22 55.3	9.949655	21 6	6 26
22	1 2 27.09	4 5.96	4 35 8.9	22 58.6	9.953447	21 6	6 28
23	1 6 33.05	+4 6.74	4 58 7.5	+23 1.2	9.957199	21 6	6 30
24	1 10 39.79	4 7.54	+5 21 8.7	23 3.1	9.960912	21 6	6 32
25	1 14 47.33	4 8.34	5 44 11.8	23 4.5	9.964585	21 6	6 34
26	1 18 55.67	4 9.15	6 7 16.3	23 4.9	9.968222	21 7	6 36
27	1 23 4.82	4 9.98	6 30 21.2	23 4.8	9.971820	21 7	6 38
28	1 27 14.80	+4 10.84	6 53 26.0	+23 3.8	9.975379	21 7	6 40
29	1 31 25.64	4 11.72	+7 16 29.8	23 2.3	9.978902	21 7	6 42
30	1 35 37.36	4 12.58	7 39 32.1	22 59.9	9.982388	21 8	6 44
31	1 39 49.94	4 13.46	8 2 32.0	22 57.0	9.985837	21 8	6 46
Juni 1	1 44 3.40	4 14.37	8 25 29.0	22 53.1	9.989248	21 8	6 48
2	1 48 17.77		8 48 22.1		9.992624	21 8	6 50

Wahrer geocentrischer Ort.

0ʰ Mittl. Zeit		AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
		h m s	m s	° ′ ″	′ ″		h m	h m
Juni	1	1 44 3.40	+4 14.37	+ 8 25 29.0	+22 53.1	9.989248	21 8	6 48
	2	1 48 17.77	4 15.28	8 48 22.1	22 48.6	9.992624	21 8	6 50
	3	1 52 33.05	4 16.20	9 11 10.7	22 43.4	9.995965	21 8	6 52
	4	1 56 49.25	4 17.14	9 33 54.1	22 37.5	9.999270	21 9	6 54
	5	2 1 6.39	+4 18.08	9 56 31.6	+22 30.7	0.002539	21 9	6 56
	6	2 5 24.47	4 19.05	+10 19 2.3	22 23.4	0.005775	21 10	6 59
	7	2 9 43.52	4 20.03	10 41 25.7	22 15.2	0.008976	21 10	7 1
	8	2 14 3.55	4 21.00	11 3 40.9	22 6.5	0.012144	21 10	7 3
	9	2 18 24.55	4 22.00	11 25 47.4	21 56.8	0.015279	21 11	7 5
	10	2 22 46.55	+4 23.02	11 47 44.2	+21 46.6	0.018380	21 11	7 7
	11	2 27 9.57	4 24.06	+12 9 30.8	21 35.7	0.021450	21 12	7 9
	12	2 31 33.63	4 25.12	12 31 6.5	21 24.0	0.024489	21 12	7 11
	13	2 35 58.75	4 26.18	12 52 30.5	21 11.8	0.027495	21 13	7 13
	14	2 40 24.93	4 27.28	13 13 42.3	20 58.6	0.030472	21 13	7 15
	15	2 44 52.21	+4 28.38	13 34 40.9	+20 44.8	0.033417	21 14	7 17
	16	2 49 20.59	4 29.51	+13 55 25.7	20 30.4	0.036333	21 14	7 19
	17	2 53 50.10	4 30.63	14 15 56.1	20 15.3	0.039220	21 15	7 21
	18	2 58 20.73	4 31.79	14 36 11.4	19 59.4	0.042076	21 15	7 23
	19	3 2 52.52	4 32.94	14 56 10.8	19 42.8	0.044902	21 16	7 25
	20	3 7 25.46	+4 34.11	15 15 53.6	+19 25.5	0.047700	21 17	7 27
	21	3 11 59.57	4 35.30	+15 35 19.1	19 7.5	0.050470	21 17	7 29
	22	3 16 34.87	4 36.48	15 54 26.6	18 48.8	0.053210	21 18	7 31
	23	3 21 11.35	4 37.69	16 13 15.4	18 29.4	0.055922	21 18	7 33
	24	3 25 49.04	4 38.89	16 31 44.8	18 9.5	0.058605	21 19	7 35
	25	3 30 27.93	+4 40.08	16 49 54.3	+17 48.5	0.061262	21 20	7 37
	26	3 35 8.01	4 41.29	+17 7 42.8	17 27.0	0.063890	21 21	7 39
	27	3 39 49.30	4 42.50	17 25 9.8	17 4.8	0.066489	21 21	7 41
	28	3 44 31.80	4 43.71	17 42 14.6	16 42.1	0.069062	21 22	7 43
	29	3 49 15.51	4 44.91	17 58 56.7	16 18.4	0.071607	21 23	7 44
	30	3 54 0.42	+4 46.08	18 15 15.1	+15 54.2	0.074126	21 24	7 46
Juli	1	3 58 46.50	4 47.25	+18 31 9.3	15 29.1	0.076617	21 25	7 48
	2	4 3 33.75	4 48.43	18 46 38.4	15 3.8	0.079081	21 25	7 50
	3	4 8 22.18	4 49.59	19 1 42.2	14 37.4	0.081517	21 26	7 51
	4	4 13 11.77	4 50.73	19 16 19.6	14 10.5	0.083929	21 27	7 53
	5	4 18 2.50	+4 51.84	19 30 30.1	+13 43.1	0.086313	21 28	7 54
	6	4 22 54.34	4 52.95	+19 44 13.2	13 14.9	0.088672	21 29	7 56
	7	4 27 47.29	4 54.02	19 57 28.1	12 46.2	0.091004	21 30	7 57
	8	4 32 41.31	4 55.09	20 10 14.3	12 16.8	0.093312	21 31	7 59
	9	4 37 36.40	4 56.13	20 22 31.1	11 46.9	0.095594	21 32	8 0
	10	4 42 32.53		20 34 18.0		0.097852	21 33	8 2

Wahrer geocentrischer Ort.

0h Mittl. Zeit		AR. h m s	Diff. m s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tag-bogen h m
Juli	9	4 37 36.40	+4 56.13	+20 22 31.1	+11 46.9	0.095594	21 32	8 0
	10	4 42 32.53	4 57.15	20 34 18.0	11 16.5	0.097852	21 33	8 2
	11	4 47 29.68	4 58.14	20 45 34.5	10 45.4	0.100086	21 34	8 3
	12	4 52 27.82	4 59.11	20 56 19.9	10 13.8	0.102295	21 35	8 4
	13	4 57 26.93	+5 0.07	21 6 33.7	+ 9 41.8	0.104480	21 36	8 5
	14	5 2 27.00	5 0.98	+21 16 15.5	9 9.1	0.106642	21 37	8 7
	15	5 7 27.98	5 1.87	21 25 24.6	8 36.0	0.108780	21 38	8 8
	16	5 12 29.85	5 2.73	21 34 0.6	8 2.5	0.110896	21 39	8 9
	17	5 17 32.58	5 3.56	21 42 3.1	7 28.5	0.112988	21 40	8 10
	18	5 22 36.14	+5 4.36	21 49 31.6	+ 6 54.0	0.115057	21 41	8 11
	19	5 27 40.50	5 5.10	+21 56 25.6	6 19.1	0.117104	21 42	8 11
	20	5 32 45.60	5 5.82	22 2 44.7	5 43.8	0.119128	21 43	8 12
	21	5 37 51.42	5 6.50	22 8 28.5	5 8.1	0.121131	21 45	8 13
	22	5 42 57.92	5 7.14	22 13 36.6	4 32.3	0.123110	21 46	8 13
	23	5 48 5.06	+5 7.74	22 18 8.9	+ 3 55.9	0.125067	21 47	8 14
	24	5 53 12.80	5 8.29	+22 22 4.8	3 19.1	0.127002	21 48	8 15
	25	5 58 21.09	5 8.79	22 25 23.9	2 42.3	0.128917	21 49	8 15
	26	6 3 29.88	5 9.26	22 28 6.2	2 5.2	0.130808	21 50	8 15
	27	6 8 39.14	5 9.68	22 30 11.4	1 27.8	0.132677	21 52	8 16
	28	6 13 48.82	+5 10.03	22 31 39.2	+ 0 50.2	0.134527	21 53	8 16
	29	6 18 58.85	5 10.34	+22 32 29.4	+ 0 12.4	0.136353	21 54	8 16
	30	6 24 9.19	5 10.60	22 32 41.8	− 0 25.5	0.138157	21 56	8 16
	31	6 29 19.79	5 10.81	22 32 16.3	1 3.5	0.139941	21 57	8 16
Aug.	1	6 34 30.60	5 10.96	22 31 12.8	1 41.6	0.141702	21 58	8 16
	2	6 39 41.56	+5 11.06	22 29 31.2	− 2 19.8	0.143442	21 59	8 15
	3	6 44 52.62	5 11.10	+22 27 11.4	2 58.0	0.145162	22 1	8 15
	4	6 50 3.72	5 11.09	22 24 13.4	3 36.3	0.146860	22 2	8 15
	5	6 55 14.81	5 11.04	22 20 37.1	4 14.4	0.148537	22 3	8 14
	6	7 0 25.85	5 10.92	22 16 22.7	4 52.6	0.150195	22 4	8 14
	7	7 5 36.77	+5 10.76	22 11 30.1	− 5 30.6	0.151831	22 5	8 13
	8	7 10 47.53	5 10.57	+22 5 59.5	6 8.6	0.153448	22 7	8 13
	9	7 15 58.10	5 10.30	21 59 50.9	6 46.5	0.155045	22 8	8 12
	10	7 21 8.40	5 10.02	21 53 4.4	7 24.2	0.156622	22 9	8 11
	11	7 26 18.42	5 9.68	21 45 40.2	8 1.6	0.158179	22 10	8 10
	12	7 31 28.10	+5 9.29	21 37 38.6	− 8 39.0	0.159718	22 11	8 9
	13	7 36 37.39	5 8.87	+21 28 59.6	9 16.1	0.161237	22 13	8 8
	14	7 41 46.26	5 8.42	21 19 43.5	9 53.0	0.162737	22 14	8 7
	15	7 46 54.68	5 7.92	21 9 50.5	10 29.6	0.164218	22 15	8 6
	16	7 52 2.60	5 7.38	20 59 20.9	11 5.9	0.165682	22 16	8 5
	17	7 57 9.98		20 48 15.0		0.167125	22 17	8 3

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Aug. 16	7 52 2.60	+5 7.38	+20 59 20.9	−11 5.9	0.165682	22 16	8 5
17	7 57 9.98	5 6.82	20 48 15.0	11 41.8	0.167125	22 17	8 3
18	8 2 16.80	5 6.22	20 36 33.2	12 17.5	0.168550	22 19	8 2
19	8 7 23.02	5 5.60	20 24 15.7	12 52.8	0.169958	22 20	8 0
20	8 12 28.62	+5 4.94	20 11 22.9	−13 27.6	0.171348	22 21	7 59
21	8 17 33.56	5 4.26	+19 57 55.3	14 2.1	0.172719	22 22	7 58
22	8 22 37.82	5 3.56	19 43 53.2	14 36.3	0.174071	22 23	7 56
23	8 27 41.38	5 2.82	19 29 16.9	15 9.9	0.175406	22 24	7 54
24	8 32 44.20	5 2.08	19 14 7.0	15 43.1	0.176724	22 26	7 53
25	8 37 46.28	+5 1.31	18 58 23.9	−16 15.7	0.178023	22 27	7 51
26	8 42 47.59	5 0.50	+18 42 8.2	16 47.9	0.179304	22 28	7 49
27	8 47 48.09	4 59.70	18 25 20.3	17 19.5	0.180568	22 29	7 47
28	8 52 47.79	4 58.88	18 8 0.8	17 50.7	0.181814	22 30	7 45
29	8 57 46.67	4 58.04	17 50 10.1	18 21.2	0.183041	22 31	7 43
30	9 2 44.71	+4 57.19	17 31 48.9	−18 51.2	0.184251	22 32	7 41
31	9 7 41.90	4 56.32	+17 12 57.7	19 20.6	0.185443	22 33	7 39
Sept. 1	9 12 38.22	4 55.45	16 53 37.1	19 49.4	0.186618	22 34	7 37
2	9 17 33.67	4 54.57	16 33 47.7	20 17.8	0.187774	22 35	7 35
3	9 22 28.24	4 53.69	16 13 29.9	20 45.3	0.188914	22 36	7 33
4	9 27 21.93	+4 52.81	15 52 44.6	−21 12.2	0.190037	22 37	7 31
5	9 32 14.74	4 51.92	+15 31 32.4	21 38.6	0.191142	22 38	7 29
6	9 37 6.66	4 51.06	15 9 53.8	22 4.4	0.192231	22 39	7 27
7	9 41 57.72	4 50.17	14 47 49.4	22 29.4	0.193302	22 40	7 25
8	9 46 47.89	4 49.32	14 25 20.0	22 53.9	0.194358	22 40	7 22
9	9 51 37.21	+4 48.46	14 2 26.1	−23 17.6	0.195398	22 41	7 20
10	9 56 25.67	4 47.62	+13 39 8.5	23 40.8	0.196420	22 42	7 18
11	10 1 13.29	4 46.79	13 15 27.7	24 3.3	0.197428	22 43	7 15
12	10 6 0.08	4 45.98	12 51 24.4	24 25.0	0.198419	22 44	7 13
13	10 10 46.06	4 45.19	12 26 59.4	24 46.2	0.199395	22 45	7 11
14	10 15 31.25	+4 44.42	12 2 13.2	−25 6.7	0.200354	22 46	7 8
15	10 20 15.67	4 43.67	+11 37 6.5	25 26.4	0.201299	22 46	7 6
16	10 24 59.34	4 42.93	11 11 40.1	25 45.6	0.202228	22 47	7 3
17	10 29 42.27	4 42.23	10 45 54.5	26 3.9	0.203141	22 48	7 1
18	10 34 24.50	4 41.56	10 19 50.6	26 21.7	0.204040	22 49	6 59
19	10 39 6.06	+4 40.90	9 53 28.9	−26 38.8	0.204925	22 50	6 56
20	10 43 46.96	4 40.28	+ 9 26 50.1	26 55.1	0.205793	22 50	6 54
21	10 48 27.24	4 39.69	8 59 55.0	27 10.7	0.206646	22 51	6 51
22	10 53 6.93	4 39.12	8 32 44.3	27 25.7	0.207484	22 52	6 49
23	10 57 46.05	4 38.58	8 5 18.6	27 39.9	0.208308	22 52	6 46
24	11 2 24.63		7 37 38.7		0.209118	22 53	6 44

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tagbogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Sept. 23	10 57 46.05	+4 38.58	+ 8 5 18.6	−27 39.9	0.208308	22 52	6 46
24	11 2 24.63	4 38.08	7 37 38.7	27 53.4	0.209118	22 53	6 44
25	11 7 2.71	4 37.61	7 9 45.3	28 6.3	0.209912	22 54	6 41
26	11 11 40.32	4 37.15	6 41 39.0	28 18.3	0.210690	22 54	6 39
27	11 16 17.47	+4 36.75	6 13 20.7	−28 29.6	0.211454	22 55	6 36
28	11 20 54.22	4 36.37	+ 5 44 51.1	28 40.3	0.212203	22 56	6 34
29	11 25 30.59	4 36.02	5 16 10.8	28 50.2	0.212937	22 56	6 31
30	11 30 6.61	4 35.69	4 47 20.6	28 59.3	0.213657	22 57	6 29
Oct. 1	11 34 42.30	4 35.41	4 18 21.3	29 7.5	0.214361	22 58	6 26
2	11 39 17.71	+4 35.16	3 49 13.8	−29 15.2	0.215052	22 58	6 24
3	11 43 52.87	4 34.95	+ 3 19 58.6	29 22.2	0.215728	22 59	6 21
4	11 48 27.82	4 34.77	2 50 36.4	29 28.4	0.216390	23 0	6 18
5	11 53 2.59	4 34.63	2 21 8.0	29 33.9	0.217037	23 0	6 16
6	11 57 37.22	4 34.53	1 51 34.1	29 38.6	0.217669	23 1	6 13
7	12 2 11.75	+4 34.46	1 21 55.5	−29 42.6	0.218290	23 2	6 11
8	12 6 46.21	4 34.44	+ 0 52 12.9	29 45.9	0.218895	23 2	6 8
9	12 11 20.65	4 34.45	+ 0 22 27.0	29 48.4	0.219487	23 3	6 6
10	12 15 55.10	4 34.50	− 0 7 21.4	29 50.2	0.220066	23 3	6 3
11	12 20 29.60	4 34.59	0 37 11.6	29 51.2	0.220631	23 4	6 1
12	12 25 4.19	+4 34.74	1 7 2.8	−29 51.5	0.221182	23 5	5 58
13	12 29 38.93	4 34.91	− 1 36 54.3	29 51.1	0.221721	23 5	5 55
14	12 34 13.84	4 35.13	2 6 45.4	29 50.0	0.222249	23 6	5 53
15	12 38 48.97	4 35.39	2 36 35.4	29 48.0	0.222761	23 7	5 50
16	12 43 24.36	4 35.69	3 6 23.4	29 45.5	0.223261	23 7	5 47
17	12 48 0.05	+4 36.03	3 36 8.9	−29 42.0	0.223749	23 8	5 45
18	12 52 36.08	4 36.43	− 4 5 50.9	29 37.8	0.224224	23 9	5 42
19	12 57 12.51	4 36.86	4 35 28.7	29 33.1	0.224686	23 9	5 40
20	13 1 49.37	4 37.33	5 5 1.8	29 27.4	0.225137	23 10	5 37
21	13 6 26.70	4 37.84	5 34 29.2	29 20.9	0.225576	23 11	5 34
22	13 11 4.54	+4 38.39	6 3 50.1	−29 13.8	0.226002	23 11	5 32
23	13 15 42.93	4 38.99	− 6 33 3.9	29 5.8	0.226414	23 12	5 29
24	13 20 21.92	4 39.61	7 2 9.7	28 57.1	0.226815	23 13	5 27
25	13 25 1.53	4 40.28	7 31 6.8	28 47.6	0.227203	23 13	5 24
26	13 29 41.81	4 40.98	7 59 54.4	28 37.3	0.227578	23 14	5 21
27	13 34 22.79	+4 41.71	8 28 31.7	−28 26.2	0.227942	23 15	5 19
28	13 39 4.50	4 42.49	− 8 56 57.9	28 14.3	0.228292	23 16	5 16
29	13 43 46.99	4 43.28	9 25 12.2	28 1.6	0.228631	23 16	5 14
30	13 48 30.27	4 44.12	9 53 13.8	27 48.1	0.228957	23 17	5 11
31	13 53 14.39	4 44.98	10 21 1.9	27 33.8	0.229271	23 18	5 9
Nov. 1	13 57 59.37		10 48 35.7		0.229572	23 19	5 6

Wahrer geocentrischer Ort.

0h Mittl. Zeit		AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
		h m s	m s	° ′ ″	′ ″		h m	h m
Oct.	31	13 53 14.39	+4 44.98	−10 21 1.9	−27 33.8	0.229271	23 18	5 9
Nov.	1	13 57 59.37	4 45.88	10 48 35.7	27 18.6	0.229572	23 19	5 6
	2	14 2 45.25	4 46.80	11 15 54.3	27 2.8	0.229861	23 20	5 4
	3	14 7 32.05	4 47.76	11 42 57.1	26 46.2	0.230139	23 20	5 1
	4	14 12 29.81	+4 48.73	12 9 43.3	−26 28.6	0.230404	23 21	4 59
	5	14 17 8.54	4 49.74	−12 36 11.9	26 10.2	0.230658	23 22	4 56
	6	14 21 58.28	4 50.78	13 2 22.1	25 51.2	0.230899	23 23	4 54
	7	14 26 49.06	4 51.84	13 28 13.3	25 31.2	0.231130	23 24	4 51
	8	14 31 40.90	4 52.91	13 53 44.5	25 10.5	0.231348	23 25	4 49
	9	14 36 33.81	+4 54.01	14 18 55.0	−24 48.9	0.231555	23 26	4 46
	10	14 41 27.82	4 55.14	−14 43 43.9	24 26.6	0.231752	23 27	4 44
	11	14 46 22.96	4 56.28	15 8 10.5	24 3.5	0.231937	23 28	4 41
	12	14 51 19.24	4 57.44	15 32 14.0	23 39.4	0.232110	23 29	4 39
	13	14 56 16.68	4 58.61	15 55 53.4	23 14.8	0.232274	23 30	4 37
	14	15 1 15.29	+4 59.81	16 19 8.2	−22 49.2	0.232427	23 31	4 34
	15	15 6 15.10	5 1.01	−16 41 57.4	22 22.9	0.232568	23 32	4 32
	16	15 11 16.11	5 2.23	17 4 20.3	21 55.8	0.232699	23 33	4 30
	17	15 16 18.34	5 3.45	17 26 16.1	21 27.8	0.232820	23 34	4 27
	18	15 21 21.79	5 4.68	17 47 43.9	20 59.3	0.232930	23 35	4 25
	19	15 26 26.47	+5 5.92	18 8 43.2	−20 29.7	0.233030	23 36	4 23
	20	15 31 32.39	5 7.15	−18 29 12.9	19 59.5	0.233118	23 37	4 21
	21	15 36 39.54	5 8.39	18 49 12.4	19 28.6	0.233197	23 39	4 19
	22	15 41 47.93	5 9.61	19 8 41.0	18 56.9	0.233264	23 40	4 17
	23	15 46 57.54	5 10.83	19 27 37.9	18 24.4	0.233322	23 41	4 15
	24	15 52 8.37	+5 12.03	19 46 2.3	−17 51.1	0.233368	23 42	4 13
	25	15 57 20.40	5 13.23	−20 3 53.4	17 17.3	0.233403	23 44	4 11
	26	16 2 33.63	5 14.39	20 21 10.7	16 42.7	0.233428	23 45	4 9
	27	16 7 48.02	5 15.54	20 37 53.4	16 7.3	0.233442	23 46	4 7
	28	16 13 3.56	5 16.67	20 54 0.7	15 31.1	0.233445	23 47	4 5
	29	16 18 20.23	+5 17.76	21 9 31.8	−14 54.5	0.233437	23 49	4 3
	30	16 23 37.99	5 18.84	−21 24 26.3	14 17.2	0.233419	23 50	4 2
Dec.	1	16 28 56.83	5 19.87	21 38 43.5	13 39.3	0.233390	23 51	4 0
	2	16 34 16.70	5 20.87	21 52 22.8	13 0.7	0.233352	23 53	3 58
	3	16 39 37.57	5 21.83	22 5 23.5	12 21.7	0.233301	23 54	3 57
	4	16 44 59.40	+5 22.75	22 17 45.2	−11 42.0	0.233240	23 56	3 55
	5	16 50 22.15	5 23.64	−22 29 27.2	11 1.6	0.233170	23 57	3 54
	6	16 55 45.79	5 24.47	22 40 28.8	11 20.9	0.233088	23 59	3 53
	7	17 1 10.26	5 25.26	22 50 49.7	9 39.9	0.232997	0 0	3 52
	8	17 6 35.52	5 25.99	23 0 29.6	8 58.1	0.232896	0 2	3 50
	9	17 12 1.51		23 9 27.7		0.232783	0 3	3 49

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Dec. 8	17 6 35.52	+5 25.99	−23 0 29.6	−8 58.1	0.232896	0 2	3 50
9	17 12 1.51	5 26.69	23 9 27.7	8 16.0	0.232783	0 3	3 49
10	17 17 28.20	5 27.32	23 17 43.7	7 33.5	0.232660	0 4	3 48
11	17 22 55.52	5 27.90	23 25 17.2	6 50.7	0.232528	0 6	3 47
12	17 28 23.42	+5 28.43	23 32 7.9	−6 7.5	0.232387	0 8	3 46
13	17 33 51.85	5 28.90	−23 38 15.4	5 23.9	0.232236	0 9	3 45
14	17 39 20.75	5 29.32	23 43 39.3	4 40.2	0.232074	0 11	3 45
15	17 44 50.07	5 29.67	23 48 19.5	3 56.2	0.231903	0 12	3 44
16	17 50 19.74	5 29.97	23 52 15.7	3 11.9	0.231723	0 14	3 44
17	17 55 49.71	+5 30.20	23 55 27.6	−2 27.5	0.231532	0 15	3 44
18	18 1 19.91	5 30.38	−23 57 55.1	1 43.0	0.231332	0 17	3 43
19	18 6 50.29	5 30.50	23 59 38.1	0 58.3	0.231122	0 18	3 43
20	18 12 20.79	5 30.54	24 0 36.4	−0 13.6	0.230902	0 20	3 43
21	18 17 51.33	5 30.52	24 0 50.0	+0 31.2	0.230673	0 22	3 43
22	18 23 21.85	+5 30.43	24 0 18.8	+1 15.9	0.230435	0 23	3 43
23	18 28 52.28	5 30.29	−23 59 2.9	2 0.7	0.230186	0 25	3 43
24	18 34 22.57	5 30.08	23 57 2.2	2 45.3	0.229927	0 26	3 43
25	18 39 52.65	5 29.79	23 54 16.9	3 29.9	0.229657	0 28	3 44
26	18 45 22.44	5 29.46	23 50 47.0	4 14.2	0.229377	0 29	3 44
27	18 50 51.90	+5 29.03	23 46 32.8	+4 58.4	0.229087	0 31	3 45
28	18 56 20.93	5 28.56	−23 41 34.4	5 42.5	0.228787	0 33	3 45
29	19 1 49.49	5 28.02	23 35 51.9	6 26.2	0.228476	0 34	3 46
30	19 7 17.51	5 27.43	23 29 25.7	7 9.7	0.228155	0 36	3 47
31	19 12 44.94	5 26.78	23 22 16.0	7 52.9	0.227824	0 37	3 48
32	19 18 11.72	+5 26.05	23 14 23.1	+8 35.7	0.227483	0 39	3 49
33	19 23 37.77		−23 5 47.4		0.227131	0 40	3 50

Wahrer geocentrischer Ort.

0h Mittl. Zeit		AR. h m s	Diff. m s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tagbogen h m
Jan.	0	20 4 45.02	+3 17.72	−21 30 26.6	+9 48.8	0.357017	1 28	4 1
	1	20 8 2.74	3 17.39	21 20 37.8	10 3.2	0.357359	1 27	4 2
	2	20 11 20.13	3 17.06	21 10 34.6	10 17.5	0.357698	1 27	4 3
	3	20 14 37.19	3 16.71	21 0 17.1	10 31.7	0.358035	1 26	4 4
	4	20 17 53.90	+3 16.36	20 49 45.4	+10 45.8	0.358370	1 25	4 6
	5	20 21 10.26	3 16.00	−20 38 59.6	10 59.6	0.358702	1 25	4 7
	6	20 24 26.26	3 15.63	20 28 0.0	11 13.3	0.359032	1 24	4 8
	7	20 27 41.89	3 15.25	20 16 46.7	11 26.8	0.359360	1 23	4 9
	8	20 30 57.14	3 14.86	20 5 19.9	11 40.2	0.359686	1 23	4 10
	9	20 34 12.00	+3 14.47	19 53 39.7	+11 53.4	0.360010	1 22	4 12
	10	20 37 26.47	3 14.07	−19 41 46.3	12 6.4	0.360331	1 21	4 13
	11	20 40 40.54	3 13.66	19 29 39.9	12 19.2	0.360650	1 21	4 14
	12	20 43 54.20	3 13.24	19 17 20.7	12 31.9	0.360967	1 20	4 16
	13	20 47 7.44	3 12.82	19 4 48.8	12 44.3	0.361281	1 19	4 17
	14	20 50 20.26	+3 12.39	18 52 4.5	+12 56.5	0.361593	1 18	4 18
	15	20 53 32.65	3 11.95	−18 39 8.0	13 8.7	0.361903	1 18	4 20
	16	20 56 44.60	3 11.51	18 25 59.3	13 20.5	0.362212	1 17	4 21
	17	20 59 56.11	3 11.07	18 12 38.8	13 32.3	0.362518	1 16	4 23
	18	21 3 7.18	3 10.63	17 59 6.5	13 43.7	0.362822	1 15	4 24
	19	21 6 17.81	+3 10.17	17 45 22.8	+13 55.0	0.363125	1 15	4 25
	20	21 9 27.98	3 9.72	−17 31 27.8	14 6.2	0.363426	1 14	4 27
	21	21 12 37.70	3 9.26	17 17 21.6	14 17.1	0.363725	1 13	4 28
	22	21 15 46.96	3 8.82	17 3 4.5	14 27.9	0.364023	1 12	4 30
	23	21 18 55.78	3 8.37	16 48 36.6	14 38.4	0.364320	1 12	4 31
	24	21 22 4.15	+3 7.92	16 33 58.2	+14 48.8	0.364615	1 11	4 33
	25	21 25 12.07	3 7.47	−16 19 9.4	14 58.9	0.364909	1 10	4 34
	26	21 28 19.54	3 7.03	16 4 10.5	15 8.9	0.365201	1 9	4 36
	27	21 31 26.57	3 6.58	15 49 1.6	15 18.7	0.365492	1 8	4 37
	28	21 34 33.15	3 6.15	15 33 42.9	15 28.3	0.365782	1 7	4 39
	29	21 37 39.30	+3 5.71	15 18 14.6	+15 37.6	0.366071	1 7	4 40
	30	21 40 45.01	3 5.27	−15 2 37.0	15 46.8	0.366358	1 6	4 42
	31	21 43 50.28	3 4.85	14 46 50.2	15 55.7	0.366643	1 5	4 44
Febr.	1	21 46 55.13	3 4.41	14 30 54.5	16 4.5	0.366927	1 4	4 45
	2	21 49 59.54	3 3.98	14 14 50.0	16 13.0	0.367210	1 3	4 47
	3	21 53 3.52	+3 3.55	13 58 37.0	+16 21.3	0.367491	1 2	4 48
	4	21 56 7.07	3 3.13	−13 42 15.7	16 29.5	0.367770	1 1	4 50
	5	21 59 10.20	3 2.71	13 25 46.2	16 37.3	0.368048	1 1	4 51
	6	22 2 12.91	3 2.29	13 9 8.9	16 44.9	0.368324	1 0	4 53
	7	22 5 15.20	3 1.87	12 52 24.0	16 52.4	0.368599	0 59	4 55
	8	22 8 17.07		12 35 31.6		0.368871	0 58	4 56

Wahrer geocentrischer Ort.

0ʰ Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tagbogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Febr. 7	22 5 15.20	+3 1.87	−12 52 24.0	+16 52.4	0.368599	0 59	4 55
8	22 8 17.07	3 1.46	12 35 31.6	16 59.7	0.368871	0 58	4 56
9	22 11 18.53	3 1.05	12 18 31.9	17 6.6	0.369142	0 57	4 58
10	22 14 19.58	3 0.64	12 1 25.3	17 13.4	0.369412	0 56	4 59
11	22 17 20.22	+3 0.24	11 44 11.9	+17 20.0	0.369679	0 55	5 1
12	22 20 20.46	2 59.83	−11 26 51.9	17 26.3	0.369945	0 54	5 3
13	22 23 20.29	2 59.44	11 9 25.6	17 32.5	0.370210	0 53	5 4
14	22 26 19.73	2 59.05	10 51 53.1	17 38.3	0.370472	0 52	5 6
15	22 29 18.78	2 58.65	10 34 14.8	17 44.0	0.370733	0 51	5 7
16	22 32 17.43	+2 58.27	10 16 30.8	+17 49.6	0.370993	0 50	5 9
17	22 35 15.70	2 57.90	− 9 58 41.2	17 54.8	0.371251	0 49	5 11
18	22 38 13.60	2 57.52	9 40 46.4	17 59.9	0.371508	0 48	5 12
19	22 41 11.12	2 57.17	9 22 46.5	18 4.7	0.371763	0 47	5 14
20	22 44 8.29	2 56.81	9 4 41.8	18 9.4	0.372017	0 46	5 16
21	22 47 5.10	+2 56.46	8 46 32.4	+18 13.9	0.372270	0 45	5 17
22	22 50 1.56	2 56.12	− 8 28 18.5	18 18.2	0.372522	0 44	5 19
23	22 52 57.68	2 55.80	8 10 0.3	18 22.3	0.372772	0 43	5 21
24	22 55 53.48	2 55.48	7 51 38.0	18 26.1	0.373021	0 42	5 22
25	22 58 48.96	2 55.17	7 33 11.9	18 29.8	0.373269	0 41	5 24
26	23 1 44.13	+2 54.87	7 14 42.1	+18 33.3	0.373516	0 40	5 26
27	23 4 39.00	2 54.57	− 6 56 8.8	18 36.5	0.373761	0 39	5 27
28	23 7 33.57	2 54.29	6 37 32.3	18 39.6	0.374005	0 38	5 29
März 1	23 10 27.86	2 54.01	6 18 52.7	18 42.5	0.374247	0 37	5 31
2	23 13 21.87	2 53.74	6 0 10.2	18 45.2	0.374488	0 36	5 32
3	23 16 15.61	+2 53.48	5 41 25.0	+18 47.6	0.374727	0 35	5 34
4	23 19 9.09	2 53.22	− 5 22 37.4	18 49.9	0.374965	0 34	5 36
5	23 22 2.31	2 52.98	5 3 47.5	18 51.9	0.375201	0 33	5 37
6	23 24 55.29	2 52.74	4 44 55.6	18 53.8	0.375435	0 32	5 39
7	23 27 48.03	2 52.51	4 26 1.8	18 55.4	0.375667	0 31	5 40
8	23 30 40.54	+2 52.28	4 7 6.4	+18 56.8	0.375897	0 30	5 42
9	23 33 32.82	2 52.06	− 3 48 9.6	18 58.1	0.376126	0 29	5 44
10	23 36 24.88	2 51.85	3 29 11.5	18 59.1	0.376352	0 28	5 45
11	23 39 16.73	2 51.65	3 10 12.4	18 59.9	0.376576	0 27	5 47
12	23 42 8.38	2 51.44	2 51 12.5	19 0.5	0.376799	0 25	5 49
13	23 44 59.82	+2 51.25	2 32 12.0	+19 1.0	0.377019	0 24	5 50
14	23 47 51.07	2 51.07	− 2 13 11.0	19 1.1	0.377237	0 23	5 52
15	23 50 42.14	2 50.88	1 54 9.9	19 1.2	0.377453	0 22	5 54
16	23 53 33.02	2 50.72	1 35 8.7	19 1.0	0.377667	0 21	5 55
17	23 56 23.74	2 50.55	1 16 7.7	19 0.6	0.377879	0 20	5 57
18	23 59 14.29		0 57 7.1		0.378090	0 19	5 59

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
März 17	23 56 23.74	+2 50.55	−1 16 7.7	+19 0.6	0.377879	0 20	5 57
18	23 59 14.29	2 50.39	0 57 7.1	19 0.1	0.378090	0 19	5 59
19	0 2 4.68	2 50.25	0 38 7.0	18 59.4	0.378298	0 18	6 0
20	0 4 54.93	2 50.12	0 19 7.6	18 58.5	0.378505	0 17	6 2
21	0 7 45.05	+2 49.98	−0 0 9.1	+18 57.4	0.378709	0 16	6 4
22	0 10 35.03	2 49.87	+0 18 48.3	18 56.2	0.378912	0 15	6 5
23	0 13 24.90	2 49.77	0 37 44.5	18 54.7	0.379113	0 13	6 7
24	0 16 14.67	2 49.66	0 56 39.2	18 53.1	0.379312	0 12	6 9
25	0 19 4.33	2 49.58	1 15 32.3	18 51.4	0.379509	0 11	6 10
26	0 21 53.91	+2 49.50	1 34 23.7	+18 49.4	0.379704	0 10	6 12
27	0 24 43.41	2 49.43	+1 53 13.1	18 47.3	0.379897	0 9	6 13
28	0 27 32.84	2 49.37	2 12 0.4	18 44.9	0.380088	0 8	6 15
29	0 30 22.21	2 49.33	2 30 45.3	18 42.5	0.380277	0 7	6 17
30	0 33 11.54	2 49.27	2 49 27.8	18 39.9	0.380464	0 6	6 18
31	0 36 0.81	+2 49.25	3 8 7.7	+18 37.0	0.380648	0 4	6 20
April 1	0 38 50.06	2 49.21	+3 26 44.7	18 34.1	0.380830	0 3	6 22
2	0 41 39.27	2 49.20	3 45 18.8	18 30.9	0.381009	0 2	6 23
3	0 44 28.47	2 49.19	4 3 49.7	18 27.5	0.381186	0 1	6 25
4	0 47 17.66	2 49.19	4 22 17.2	18 24.0	0.381360	0 0	6 27
5	0 50 6.85	+2 49.18	4 40 41.2	+18 20.3	0.381532	23 59	6 28
6	0 52 56.03	2 49.20	+4 59 1.5	18 16.4	0.381700	23 58	6 30
7	0 55 45.23	2 49.20	5 17 17.9	18 12.4	0.381865	23 57	6 31
8	0 58 34.43	2 49.23	5 35 30.3	18 8.1	0.382028	23 55	6 33
9	1 1 23.66	2 49.25	5 53 38.4	18 3.8	0.382188	23 54	6 35
10	1 4 12.91	+2 49.27	6 11 42.2	+17 59.1	0.382344	23 53	6 36
11	1 7 2.18	2 49.31	+6 29 41.3	17 54.4	0.382498	23 52	6 38
12	1 9 51.49	2 49.35	6 47 35.7	17 49.5	0.382648	23 51	6 39
13	1 12 40.84	2 49.39	7 5 25.2	17 44.5	0.382795	23 50	6 41
14	1 15 30.23	2 49.44	7 23 9.7	17 39.2	0.382939	23 49	6 43
15	1 18 19.67	+2 49.51	7 40 48.9	+17 33.8	0.383080	23 48	6 44
16	1 21 9.18	2 49.56	+7 58 22.7	17 28.3	0.383218	23 47	6 46
17	1 23 58.74	2 49.63	8 15 51.0	17 22.5	0.383353	23 45	6 47
18	1 26 48.37	2 49.71	8 33 13.5	17 16.8	0.383485	23 44	6 49
19	1 29 38.08	2 49.80	8 50 30.3	17 10.7	0.383613	23 43	6 50
20	1 32 27.88	+2 49.89	9 7 41.0	+17 4.6	0.383739	23 42	6 52
21	1 35 17.77	2 49.99	+9 24 45.6	16 58.3	0.383862	23 41	6 54
22	1 38 7.76	2 50.10	9 41 43.9	16 51.9	0.383981	23 40	6 55
23	1 40 57.86	2 50.21	9 58 35.8	16 45.3	0.384097	23 39	6 57
24	1 43 48.07	2 50.32	10 15 21.1	16 38.6	0.384210	23 38	6 58
25	1 46 38.39		10 31 59.7		0.384320	23 37	7 0

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tagbogen
	h m s	m s	° ′ ″	′ ″		h m	h m
April 24	1 43 48.07	+2 50.32	+10 15 21.1	+16 38.6	0.384210	23 38	6 58
25	1 46 38.39	2 50.46	10 31 59.7	16 31.7	0.384320	23 37	7 0
26	1 49 28.85	2 50.59	10 48 31.4	16 24.7	0.384426	23 35	7 1
27	1 52 19.44	2 50.72	11 4 56.1	16 17.6	0.384529	23 34	7 3
28	1 55 10.16	+2 50.86	11 21 13.7	+16 10.3	0.384628	23 33	7 4
29	1 58 1.02	2 51.02	+11 37 24.0	16 2.8	0.384723	23 32	7 6
30	2 0 52.04	2 51.16	11 53 26.8	15 55.3	0.384815	23 31	7 7
Mai 1	2 3 43.20	2 51.32	12 9 22.1	15 47.6	0.384903	23 30	7 9
2	2 6 34.52	2 51.47	12 25 9.7	15 39.7	0.384987	23 29	7 11
3	2 9 25.99	+2 51.65	12 40 49.4	+15 31.7	0.385066	23 28	7 12
4	2 12 17.64	2 51.81	+12 56 21.1	15 23.6	0.385142	23 27	7 14
5	2 15 9.45	2 51.97	13 11 44.7	15 15.3	0.385213	23 26	7 15
6	2 18 1.42	2 52.14	13 27 0.0	15 6.9	0.385280	23 25	7 17
7	2 20 53.56	2 52.30	13 42 6.9	14 58.3	0.385342	23 23	7 18
8	2 23 45.86	+2 52.48	13 57 5.2	+14 49.7	0.385400	23 22	7 20
9	2 26 38.34	2 52.64	+14 11 54.9	14 40.8	0.385453	23 21	7 21
10	2 29 30.98	2 52.81	14 26 35.7	14 31.9	0.385501	23 20	7 22
11	2 32 23.79	2 52.97	14 41 7.6	14 22.7	0.385545	23 19	7 24
12	2 35 16.76	2 53.15	14 55 30.3	14 13.6	0.385585	23 18	7 25
13	2 38 9.91	+2 53.31	15 9 43.9	+14 4.2	0.385619	23 17	7 27
14	2 41 3.22	2 53.49	+15 23 48.1	13 54.7	0.385649	23 16	7 28
15	2 43 56.71	2 53.67	15 37 42.8	13 45.2	0.385675	23 15	7 30
16	2 46 50.38	2 53.83	15 51 28.0	13 35.5	0.385696	23 14	7 31
17	2 49 44.21	2 54.02	16 5 3.5	13 25.7	0.385712	23 13	7 32
18	2 52 38.23	+2 54.19	16 18 29.2	+13 15.7	0.385723	23 12	7 34
19	2 55 32.42	2 54.37	+16 31 44.9	13 5.7	0.385730	23 11	7 35
20	2 58 26.79	2 54.56	16 44 50.6	12 55.6	0.385732	23 10	7 37
21	3 1 21.35	2 54.74	16 57 46.2	12 45.4	0.385729	23 9	7 38
22	3 4 16.09	2 54.93	17 10 31.6	12 35.0	0.385721	23 8	7 39
23	3 7 11.02	+2 55.11	17 23 6.6	+12 24.6	0.385708	23 7	7 41
24	3 10 6.13	2 55.29	+17 35 31.2	12 14.1	0.385690	23 6	7 42
25	3 13 1.42	2 55.48	17 47 45.3	12 3.4	0.385668	23 5	7 43
26	3 15 56.90	2 55.66	17 59 48.7	11 52.7	0.385640	23 4	7 45
27	3 18 52.56	2 55.84	18 11 41.4	11 41.8	0.385606	23 3	7 46
28	3 21 48.40	+2 56.03	18 23 23.2	+11 30.9	0.385568	23 2	7 47
29	3 24 44.43	2 56.21	+18 34 54.1	11 19.9	0.385524	23 1	7 48
30	3 27 40.64	2 56.39	18 46 14.0	11 8.7	0.385474	23 0	7 50
31	3 30 37.03	2 56.57	18 57 22.7	10 57.5	0.385418	22 59	7 51
Juni 1	3 33 33.60	2 56.73	19 8 20.2	10 46.2	0.385357	22 58	7 52
2	3 36 30.33		19 19 6.4		0.385290	22 57	7 53

Wahrer geocentrischer Ort.

0^h Mittl. Zeit		AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
		h m s	m s	° ′ ″	′ ″		h m	h m
Juni	1	3 33 33.60	+2 56.73	+19 8 20.2	+10 46.2	0.385357	22 58	7 52
	2	3 36 30.33	2 56.90	19 19 6.4	10 34.8	0.385290	22 57	7 53
	3	3 39 27.23	2 57.06	19 29 41.2	10 23.4	0.385217	22 56	7 54
	4	3 42 24.29	2 57.22	19 40 4.6	10 11.8	0.385137	22 55	7 55
	5	3 45 21.51	+2 57.36	19 50 16.4	+10 0.1	0.385051	22 54	7 57
	6	3 48 18.87	2 57.51	+20 0 16.5	9 48.4	0.384958	22 53	7 58
	7	3 51 16.38	2 57.64	20 10 4.9	9 36.6	0.384860	22 52	7 59
	8	3 54 14.02	2 57.76	20 19 41.5	9 24.7	0.384755	22 51	8 0
	9	3 57 11.78	2 57.89	20 29 6.2	9 12.8	0.384643	22 50	8 1
	10	4 0 9.67	+2 58.02	20 38 19.0	+ 9 0.8	0.384525	22 49	8 2
	11	4 3 7.69	2 58.13	+20 47 19.8	8 48.6	0.384401	22 48	8 3
	12	4 6 5.82	2 58.23	20 56 8.4	8 36.5	0.384270	22 47	8 4
	13	4 9 4.05	2 58.33	21 4 44.9	8 24.3	0.384132	22 46	8 5
	14	4 12 2.38	2 58.43	21 13 9.2	8 12.0	0.383988	22 45	8 6
	15	4 15 0.81	+2 58.52	21 21 21.2	+ 7 59.7	0.383838	22 44	8 7
	16	4 17 59.33	2 58.61	+21 29 20.9	7 47.3	0.383681	22 43	8 8
	17	4 20 57.94	2 58.69	21 37 8.2	7 34.9	0.383517	22 42	8 9
	18	4 23 56.63	2 58.76	21 44 43.1	7 22.4	0.383347	22 41	8 10
	19	4 26 55.39	2 58.84	21 52 5.5	7 10.0	0.383170	22 40	8 11
	20	4 29 54.23	+2 58.90	21 59 15.5	+ 6 57.5	0.382986	22 39	8 12
	21	4 32 53.13	2 58.97	+22 6 13.0	6 44.8	0.382795	22 38	8 13
	22	4 35 52.10	2 59.02	22 12 57.8	6 32.2	0.382597	22 37	8 13
	23	4 38 51.12	2 59.07	22 19 30.0	6 19.5	0.382392	22 36	8 14
	24	4 41 50.19	2 59.11	22 25 49.5	6 6.9	0.382181	22 35	8 15
	25	4 44 49.30	+2 59.14	22 31 56.4	+ 5 54.2	0.381962	22 34	8 16
	26	4 47 48.44	2 59.17	+22 37 50.6	5 41.5	0.381736	22 33	8 16
	27	4 50 47.61	2 59.19	22 43 32.1	5 28.7	0.381502	22 32	8 17
	28	4 53 46.80	2 59.20	22 49 0.8	5 15.9	0.381261	22 31	8 18
	29	4 56 46.00	2 59.20	22 54 16.7	5 3.2	0.381012	22 30	8 18
	30	4 59 45.20	+2 59.19	22 59 19.9	+ 4 50.4	0.380755	22 29	8 19
Juli	1	5 2 44.39	2 59.18	+23 4 10.3	4 37.5	0.380490	22 28	8 20
	2	5 5 43.57	2 59.15	23 8 47.8	4 24.7	0.380217	22 28	8 20
	3	5 8 42.72	2 59.11	23 13 12.5	4 11.9	0.379936	22 27	8 21
	4	5 11 41.83	2 59.06	23 17 24.4	3 59.1	0.379646	22 26	8 21
	5	5 14 40.89	+2 58.99	23 21 23.5	+ 3 46.2	0.379348	22 25	8 22
	6	5 17 39.88	2 58.91	+23 25 9.7	3 33.4	0.379041	22 24	8 22
	7	5 20 38.79	2 58.83	23 28 43.1	3 20.6	0.378726	22 23	8 23
	8	5 23 37.62	2 58.74	23 32 3.7	3 7.8	0.378403	22 22	8 23
	9	5 26 36.36	2 58.63	23 35 11.5	2 55.0	0.378071	22 21	8 24
	10	5 29 34.99		23 38 6.5		0.377731	22 20	8 24

Wahrer geocentrischer Ort.

0^h Mittl. Zeit		AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
		h m s	m s	° ′ ″	′ ″		h m	h m
Juli	9	5 26 36.36	+2 58.63	+23 35 11.5	+2 55.0	0.378071	22 21	8 24
	10	5 29 34.99	2 58.51	23 38 6.5	2 42.3	0.377731	22 20	8 24
	11	5 32 33.50	2 58.39	23 40 48.8	2 29.5	0.377382	22 19	8 24
	12	5 35 31.89	2 58.26	23 43 18.3	2 16.7	0.377025	22 18	8 25
	13	5 38 30.15	+2 58.11	23 45 35.0	+2 4.0	0.376659	22 17	8 25
	14	5 41 28.26	2 57.97	+23 47 39.0	1 51.3	0.376284	22 16	8 25
	15	5 44 26.23	2 57.81	23 49 30.3	1 38.7	0.375900	22 15	8 26
	16	5 47 24.04	2 57.64	23 51 9.0	1 26.0	0.375508	22 14	8 26
	17	5 50 21.68	2 57.47	23 52 35.0	1 13.5	0.375107	22 13	8 26
	18	5 53 19.15	+2 57.29	23 53 48.5	+1 0.9	0.374698	22 12	8 26
	19	5 56 16.44	2 57.10	+23 54 49.4	0 48.3	0.374280	22 11	8 26
	20	5 59 13.54	2 56.90	23 55 37.7	0 35.9	0.373852	22 10	8 26
	21	6 2 10.44	2 56.70	23 56 13.6	0 23.4	0.373415	22 9	8 26
	22	6 5 7.14	2 56.49	23 56 37.0	+0 11.1	0.372969	22 8	8 26
	23	6 8 3.63	+2 56.27	23 56 48.1	−0 1.3	0.372514	22 7	8 26
	24	6 10 59.90	2 56.04	+23 56 46.8	0 13.5	0.372050	22 6	8 26
	25	6 13 55.94	2 55.80	23 56 33.3	0 25.8	0.371576	22 5	8 26
	26	6 16 51.74	2 55.56	23 56 7.5	0 38.0	0.371092	22 4	8 26
	27	6 19 47.30	2 55.30	23 55 29.5	0 50.0	0.370599	22 3	8 26
	28	6 22 42.60	+2 55.04	23 54 39.5	−1 2.1	0.370096	22 2	8 26
	29	6 25 37.64	2 54.77	+23 53 37.4	1 14.0	0.369582	22 1	8 26
	30	6 28 32.41	2 54.48	23 52 23.4	1 25.9	0.369058	22 0	8 26
	31	6 31 26.89	2 54.19	23 50 57.5	1 37.8	0.368524	21 59	8 26
Aug.	1	6 34 21.08	2 53.88	23 49 19.7	1 49.5	0.367979	21 58	8 26
	2	6 37 14.96	+2 53.57	23 47 30.2	−2 1.1	0.367424	21 57	8 25
	3	6 40 8.53	2 53.24	+23 45 29.1	2 12.7	0.366858	21 56	8 25
	4	6 43 1.77	2 52.90	23 43 16.4	2 24.3	0.366282	21 55	8 25
	5	6 45 54.67	2 52.56	23 40 52.1	2 35.7	0.365695	21 54	8 25
	6	6 48 47.23	2 52.20	23 38 16.4	2 47.0	0.365097	21 53	8 24
	7	6 51 39.43	+2 51.84	23 35 29.4	−2 58.2	0.364488	21 52	8 24
	8	6 54 31.27	2 51.46	+23 32 31.2	3 9.4	0.363868	21 50	8 23
	9	6 57 22.73	2 51.09	23 29 21.8	3 20.5	0.363238	21 49	8 23
	10	7 0 13.82	2 50.71	23 26 1.3	3 31.5	0.362597	21 48	8 23
	11	7 3 4.53	2 50.32	23 22 29.8	3 42.4	0.361944	21 47	8 22
	12	7 5 54.85	+2 49.93	23 18 47.4	−3 53.1	0.361280	21 46	8 22
	13	7 8 44.78	2 49.53	+23 14 54.3	4 3.8	0.360606	21 45	8 21
	14	7 11 34.31	2 49.12	23 10 50.5	4 14.5	0.359921	21 44	8 21
	15	7 14 23.43	2 48.71	23 6 36.0	4 25.0	0.359224	21 43	8 20
	16	7 17 12.14	2 48.29	23 2 11.0	4 35.4	0.358517	21 42	8 19
	17	7 20 0.43		22 57 35.6		0.357798	21 40	8 19

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Aug. 16	7 17 12.14	+2 48.29	+23 2 11.0	−4 35.4	0.358517	21 42	8 19
17	7 20 0.43	2 47.88	22 57 35.6	4 45.7	0.357798	21 40	8 19
18	7 22 48.31	2 47.46	22 52 49.9	4 56.0	0.357067	21 39	8 18
19	7 25 35.77	2 47.03	22 47 53.9	5 6.1	0.356325	21 38	8 18
20	7 28 22.80	+2 46.61	22 42 47.8	−5 16.0	0.355571	21 37	8 17
21	7 31 9.41	2 46.17	+22 37 31.8	5 26.0	0.354806	21 36	8 16
22	7 33 55.58	2 45.74	22 32 5.8	5 35.8	0.354029	21 35	8 16
23	7 36 41.32	2 45.29	22 26 30.0	5 45.4	0.353240	21 33	8 15
24	7 39 26.61	2 44.85	22 20 44.6	5 55.0	0.352439	21 32	8 14
25	7 42 11.46	+2 44.40	22 14 49.6	−6 4.5	0.351625	21 31	8 14
26	7 44 55.86	2 43.94	+22 8 45.1	6 13.8	0.350799	21 30	8 13
27	7 47 39.80	2 43.48	22 2 31.3	6 23.0	0.349960	21 29	8 12
28	7 50 23.28	2 43.01	21 56 8.3	6 32.1	0.349108	21 27	8 11
29	7 53 6.29	2 42.53	21 49 36.2	6 41.0	0.348243	21 26	8 11
30	7 55 48.82	+2 42.06	21 42 55.2	−6 49.9	0.347366	21 25	8 10
31	7 58 30.88	2 41.57	+21 36 5.3	6 58.6	0.346475	21 24	8 9
Sept. 1	8 1 12.45	2 41.08	21 29 6.7	7 7.1	0.345571	21 22	8 8
2	8 3 53.53	2 40.58	21 21 59.6	7 15.6	0.344653	21 21	8 7
3	8 6 34.11	2 40.08	21 14 44.0	7 24.0	0.343722	21 20	8 6
4	8 9 14.19	+2 39.58	21 7 20.0	−7 32.2	0.342778	21 19	8 6
5	8 11 53.77	2 39.07	+20 59 47.8	7 40.3	0.341821	21 17	8 5
6	8 14 32.84	2 38.56	20 52 7.5	7 48.2	0.340850	21 16	8 4
7	8 17 11.40	2 38.05	20 44 19.3	7 56.1	0.339865	21 15	8 3
8	8 19 49.45	2 37.54	20 36 23.2	8 3.8	0.338867	21 14	8 2
9	8 22 26.99	+2 37.02	20 28 19.4	−8 11.4	0.337855	21 12	8 1
10	8 25 4.01	2 36.51	+20 20 8.0	8 18.8	0.336829	21 11	8 0
11	8 27 40.52	2 35.99	20 11 49.2	8 26.2	0.335790	21 10	7 59
12	8 30 16.51	2 35.48	20 3 23.0	8 33.5	0.334737	21 8	7 58
13	8 32 51.99	2 34.96	19 54 49.5	8 40.6	0.333670	21 7	7 57
14	8 35 26.95	+2 34.45	19 46 8.9	−8 47.6	0.332589	21 5	7 56
15	8 38 1.40	2 33.93	+19 37 21.3	8 54.4	0.331494	21 4	7 55
16	8 40 35.33	2 33.43	19 28 26.9	9 1.2	0.330385	21 3	7 54
17	8 43 8.76	2 32.91	19 19 25.7	9 7.9	0.329261	21 1	7 53
18	8 45 41.67	2 32.40	19 10 17.8	9 14.4	0.328123	21 0	7 52
19	8 48 14.07	+2 31.88	19 1 3.4	−9 20.7	0.326970	20 59	7 51
20	8 50 45.95	2 31.38	+18 51 42.7	9 26.9	0.325803	20 57	7 50
21	8 53 17.33	2 30.87	18 42 15.8	9 33.1	0.324621	20 56	7 49
22	8 55 48.20	2 30.36	18 32 42.7	9 39.1	0.323423	20 54	7 48
23	8 58 18.56	2 29.84	18 23 3.6	9 44.9	0.322210	20 53	7 47
24	9 0 48.40		18 13 18.7		0.320982	20 51	7 46

Wahrer geocentrischer Ort.

0ʰ Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
Sept. 23	8ʰ 58ᵐ 18ˢ.56	+2ᵐ 29ˢ.84	+18° 23′ 3″.6	−9′ 44″.9	0.322210	20ʰ 53ᵐ	7ʰ 47ᵐ
24	9 0 48.40	2 29.33	18 13 18.7	9 50.7	0.320982	20 51	7 46
25	9 3 17.73	2 28.82	18 3 28.0	9 56.2	0.319738	20 50	7 45
26	9 5 46.55	2 28.30	17 53 31.8	10 1.7	0.318478	20 49	7 44
27	9 8 14.85	+2 27.77	17 43 30.1	−10 7.0	0.317203	20 47	7 43
28	9 10 42.62	2 27.25	+17 33 23.1	10 12.1	0.315911	20 46	7 42
29	9 13 9.87	2 26.73	17 23 11.0	10 17.2	0.314603	20 44	7 41
30	9 15 36.60	2 26.20	17 12 53.8	10 22.0	0.313278	20 43	7 40
Oct. 1	9 18 2.80	2 25.67	17 2 31.8	10 26.8	0.311937	20 41	7 38
2	9 20 28.47	+2 25.14	16 52 5.0	−10 31.4	0.310580	20 40	7 37
3	9 22 53.61	2 24.61	+16 41 33.6	10 35.8	0.309206	20 38	7 36
4	9 25 18.22	2 24.08	16 30 57.8	10 40.2	0.307816	20 36	7 35
5	9 27 42.30	2 23.55	16 20 17.6	10 44.5	0.306409	20 35	7 34
6	9 30 5.85	2 23.02	16 9 33.1	10 48.5	0.304985	20 33	7 33
7	9 32 28.87	+2 22.49	15 58 44.6	−10 52.5	0.303544	20 32	7 32
8	9 34 51.36	2 21.97	+15 47 52.1	10 56.4	0.302087	20 30	7 31
9	9 37 13.33	2 21.44	15 36 55.7	11 0.2	0.300613	20 29	7 30
10	9 39 34.77	2 20.92	15 25 55.5	11 3.7	0.299122	20 27	7 28
11	9 41 55.69	2 20.39	15 14 51.8	11 7.2	0.297614	20 26	7 27
12	9 44 16.08	+2 19.88	15 3 44.6	−11 10.6	0.296089	20 24	7 26
13	9 46 35.96	2 19.36	+14 52 34.0	11 13.8	0.294546	20 22	7 25
14	9 48 55.32	2 18.85	14 41 20.2	11 16.9	0.292986	20 21	7 24
15	9 51 14.17	2 18.34	14 30 3.3	11 20.0	0.291409	20 19	7 23
16	9 53 32.51	2 17.82	14 18 43.3	11 22.8	0.289814	20 17	7 22
17	9 55 50.33	+2 17.32	14 7 20.5	−11 25.6	0.288202	20 16	7 21
18	9 58 7.65	2 16.82	+13 55 54.9	11 28.2	0.286571	20 14	7 19
19	10 0 24.47	2 16.31	13 44 26.7	11 30.7	0.284922	20 12	7 18
20	10 2 40.78	2 15.81	13 32 56.0	11 33.1	0.283254	20 11	7 17
21	10 4 56.59	2 15.31	13 21 22.9	11 35.4	0.281568	20 9	7 16
22	10 7 11.90	+2 14.80	13 9 47.5	−11 37.4	0.279863	20 7	7 15
23	10 9 26.70	2 14.29	+12 58 10.1	11 39.4	0.278139	20 6	7 14
24	10 11 40.99	2 13.78	12 46 30.7	11 41.3	0.276396	20 4	7 13
25	10 13 54.77	2 13.27	12 34 49.4	11 42.9	0.274633	20 2	7 11
26	10 16 8.04	2 12.76	12 23 6.5	11 44.4	0.272851	20 1	7 10
27	10 18 20.80	+2 12.25	12 11 22.1	−11 45.9	0.271049	19 59	7 9
28	10 20 33.05	2 11.72	+11 59 36.2	11 47.1	0.269227	19 57	7 8
29	10 22 44.77	2 11.20	11 47 49.1	11 48.3	0.267386	19 55	7 7
30	10 24 55.97	2 10.68	11 36 0.8	11 49.3	0.265524	19 54	7 6
31	10 27 6.65	2 10.16	11 24 11.5	11 50.1	0.263642	19 52	7 5
Nov. 1	10 29 16.81		11 12 21.4		0.261740	19 50	7 4

Wahrer geocentrischer Ort.

0^h Mittl. Zeit		AR. h m s	Diff. m s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tagbogen h m
Oct.	31	10 27 6.65	+2 10.16	+11 24 11.5	−11 50.1	0.263642	19 52	7 5
Nov.	1	10 29 16.81	2 9.62	11 12 21.4	11 50.8	0.261740	19 50	7 4
	2	10 31 26.43	2 9.10	11 0 30.6	11 51.5	0.259818	19 48	7 2
	3	10 33 35.53	2 8.57	10 48 39.1	11 52.0	0.257875	19 47	7 1
	4	10 35 44.10	+2 8.05	10 36 47.1	−11 52.3	0.255912	19 45	7 0
	5	10 37 52.15	2 7.51	+10 24 54.8	11 52.6	0.253928	19 43	6 59
	6	10 39 59.66	2 6.98	10 13 2.2	11 52.7	0.251924	19 41	6 58
	7	10 42 6.64	2 6.45	10 1 9.5	11 52.7	0.249900	19 39	6 57
	8	10 44 13.09	2 5.92	9 49 16.8	11 52.6	0.247854	19 37	6 56
	9	10 46 19.01	+2 5.39	9 37 24.2	−11 52.3	0.245788	19 36	6 55
	10	10 48 24.40	2 4.86	+ 9 25 31.9	11 52.0	0.243701	19 34	6 54
	11	10 50 29.26	2 4.33	9 13 39.9	11 51.5	0.241593	19 32	6 53
	12	10 52 33.59	2 3.80	9 1 48.4	11 51.0	0.239464	19 30	6 51
	13	10 54 37.39	2 3.27	8 49 57.4	11 50.3	0.237313	19 28	6 50
	14	10 56 40.66	+2 2.75	8 38 7.1	−11 49.4	0.235141	19 26	6 49
	15	10 58 43.41	2 2.22	+ 8 26 17.7	11 48.5	0.232947	19 24	6 48
	16	11 0 45.63	2 1.68	8 14 29.2	11 47.4	0.230731	19 22	6 47
	17	11 2 47.31	2 1.15	8 2 41.8	11 46.3	0.228493	19 21	6 46
	18	11 4 48.46	2 0.61	7 50 55.5	11 44.9	0.226233	19 19	6 45
	19	11 6 49.07	+2 0.07	7 39 10.6	−11 43.5	0.223950	19 17	6 44
	20	11 8 49.14	1 59.52	+ 7 27 27.1	11 41.9	0.221644	19 15	6 43
	21	11 10 48.66	1 58.96	7 15 45.2	11 40.1	0.219315	19 13	6 42
	22	11 12 47.62	1 58.40	7 4 5.1	11 38.1	0.216963	19 11	6 41
	23	11 14 46.02	1 57.83	6 52 27.0	11 36.2	0.214587	19 9	6 40
	24	11 16 43.85	+1 57.26	6 40 50.8	−11 34.0	0.212188	19 7	6 39
	25	11 18 41.11	1 56.67	+ 6 29 16.8	11 31.6	0.209765	19 5	6 38
	26	11 20 37.78	1 56.08	6 17 45.2	11 29.2	0.207318	19 3	6 37
	27	11 22 33.86	1 55.48	6 6 16.0	11 26.6	0.204846	19 1	6 36
	28	11 24 29.34	1 54.87	5 54 49.4	11 23.8	0.202351	18 59	6 35
	29	11 26 24.21	+1 54.26	5 43 25.6	−11 21.0	0.199832	18 57	6 34
	30	11 28 18.47	1 53.64	+ 5 32 4.6	11 18.0	0.197289	18 55	6 33
Dec.	1	11 30 12.11	1 53.00	5 20 46.6	11 14.8	0.194721	18 53	6 32
	2	11 32 5.11	1 52.37	5 9 31.8	11 11.5	0.192129	18 51	6 31
	3	11 33 57.48	1 51.73	4 58 20.3	11 8.2	0.189513	18 49	6 30
	4	11 35 49.21	+1 51.08	4 47 12.1	−11 4.6	0.186872	18 47	6 29
	5	11 37 40.29	1 50.42	+ 4 36 7.5	11 1.0	0.184207	18 44	6 28
	6	11 39 30.71	1 49.75	4 25 6.5	10 57.2	0.181517	18 42	6 27
	7	11 41 20.46	1 49.09	4 14 9.3	10 53.4	0.178802	18 40	6 26
	8	11 43 9.55	1 48.41	4 3 15.9	10 49.3	0.176063	18 38	6 25
	9	11 44 57.96		3 52 26.6		0.173299	18 36	6 24

Wahrer geocentrischer Ort.

0h Mittl. Zeit		AR. h m s	Diff. m s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tag-bogen h m
Dec.	8	11 43 9.55	+1 48.41	+4 3 15.9	−10 49.3	0.176063	18 38	6 25
	9	11 44 57.96	1 47.72	3 52 26.6	10 45.2	0.173299	18 36	6 24
	10	11 46 45.68	1 47.03	3 41 41.4	10 40.9	0.170510	18 34	6 23
	11	11 48 32.71	1 46.33	3 31 0.5	10 36.5	0.167697	18 32	6 22
	12	11 50 19.04	+1 45.63	3 20 24.0	−10 32.1	0.164858	18 29	6 21
	13	11 52 4.67	1 44.91	+3 9 51.9	10 27.4	0.161994	18 27	6 20
	14	11 53 49.58	1 44.19	2 59 24.5	10 22.7	0.159104	18 25	6 19
	15	11 55 33.77	1 43.45	2 49 1.8	10 17.8	0.156189	18 23	6 18
	16	11 57 17.22	1 42.71	2 38 44.0	10 12.7	0.153248	18 21	6 17
	17	11 58 59.93	+1 41.94	2 28 31.3	−10 7.5	0.150281	18 18	6 17
	18	12 0 41.87	1 41.17	+2 18 23.8	10 2.2	0.147287	18 16	6 16
	19	12 2 23.04	1 40.37	2 8 21.6	9 56.7	0.144267	18 14	6 15
	20	12 4 3.41	1 39.56	1 58 24.9	9 51.0	0.141220	18 12	6 14
	21	12 5 42.97	1 38.73	1 48 33.9	9 45.1	0.138147	18 9	6 13
	22	12 7 21.70	+1 37.88	1 38 48.8	−9 39.2	0.135047	18 7	6 12
	23	12 8 59.58	1 37.00	+1 29 9.6	9 33.0	0.131919	18 5	6 11
	24	12 10 36.58	1 36.12	1 19 36.6	9 26.7	0.128765	18 2	6 11
	25	12 12 12.70	1 35.21	1 10 9.9	9 20.2	0.125584	18 0	6 10
	26	12 13 47.91	1 34.29	1 0 49.7	9 13.6	0.122376	17 58	6 9
	27	12 15 22.20	+1 33.34	0 51 36.1	−9 6.8	0.119140	17 55	6 8
	28	12 16 55.54	1 32.37	+0 42 29.3	8 59.8	0.115878	17 53	6 7
	29	12 18 27.91	1 31.38	0 33 29.5	8 52.7	0.112589	17 51	6 7
	30	12 19 59.29	1 30.37	0 24 36.8	8 45.5	0.109274	17 48	6 6
	31	12 21 29.66	1 29.34	0 15 51.3	8 38.2	0.105932	17 46	6 5
	32	12 22 59.00	+1 28.30	+0 7 13.1	−8 30.6	0.102564	17 43	6 4
	33	12 24 27.30		−0 1 17.5		0.099169	17 41	6 4

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Jan. 0	19 32 10.33	+1 58.95	−22 1 59.0	+4 13.1	0.785292	0 56	3 57
2	19 34 9.28	1 59.19	21 57 45.9	4 19.1	0.785691	0 50	3 58
4	19 36 8.47	1 59.38	21 53 26.8	4 25.0	0.786030	0 44	3 58
6	19 38 7.85	1 59.50	21 49 1.8	4 30.7	0.786308	0 38	3 59
8	19 40 7.35	+1 59.57	21 44 31.1	+4 36.4	0.786525	0 32	3 59
10	19 42 6.92	1 59.59	−21 39 54.7	4 41.9	0.786682	0 26	4 0
12	19 44 6.51	1 59.56	21 35 12.8	4 47.3	0.786777	0 20	4 0
14	19 46 6.07	1 59.48	21 30 25.5	4 52.4	0.786811	0 14	4 1
16	19 48 5.55	1 59.34	21 25 33.1	4 57.5	0.786784	0 8	4 1
18	19 50 4.89	+1 59.16	21 20 35.6	+5 2.4	0.786696	0 2	4 2
20	19 52 4.05	1 58.93	−21 15 33.2	5 7.1	0.786548	23 56	4 3
22	19 54 2.98	1 58.67	21 10 26.1	5 11.8	0.786339	23 51	4 3
24	19 56 1.65	1 58.36	21 5 14.3	5 16.2	0.786070	23 45	4 4
26	19 58 0.01	1 58.02	20 59 58.1	5 20.6	0.785741	23 39	4 4
28	19 59 58.03	+1 57.64	20 54 37.5	+5 24.7	0.785352	23 33	4 5
30	20 1 55.67	1 57.21	−20 49 12.8	5 28.6	0.784903	23 27	4 6
Febr. 1	20 3 52.88	1 56.73	20 43 44.2	5 32.3	0.784394	23 21	4 6
3	20 5 49.61	1 56.21	20 38 11.9	5 35.8	0.783824	23 15	4 7
5	20 7 45.82	1 55.63	20 32 36.1	5 39.0	0.783195	23 9	4 7
7	20 9 41.45	+1 55.02	20 26 57.1	+5 42.0	0.782505	23 3	4 8
9	20 11 36.47	1 54.34	−20 21 15.1	5 44.7	0.781755	22 57	4 9
11	20 13 30.81	1 53.62	20 15 30.4	5 47.1	0.780946	22 51	4 9
13	20 15 24.43	1 52.85	20 9 43.3	5 49.4	0.780078	22 45	4 10
15	20 17 17.28	1 52.04	20 3 53.9	5 51.3	0.779150	22 39	4 11
17	20 19 9.32	+1 51.18	19 58 2.6	+5 53.1	0.778163	22 33	4 11
19	20 21 0.50	1 50.29	−19 52 9.5	5 54.6	0.777119	22 27	4 12
21	20 22 50.79	1 49.37	19 46 14.9	5 55.8	0.776018	22 21	4 13
23	20 24 40.16	1 48.41	19 40 19.1	5 56.8	0.774860	22 15	4 13
25	20 26 28.57	1 47.40	19 34 22.3	5 57.5	0.773644	22 9	4 14
27	20 28 15.97	+1 46.36	19 28 24.8	+5 57.9	0.772372	22 3	4 15
März 1	20 30 2.33	1 45.27	−19 22 26.9	5 57.9	0.771044	21 57	4 15
3	20 31 47.60	1 44.12	19 16 29.0	5 57.6	0.769659	21 51	4 16
5	20 33 31.72	1 42.93	19 10 31.4	5 57.2	0.768218	21 44	4 16
7	20 35 14.65	1 41.70	19 4 34.2	5 56.3	0.766722	21 38	4 17
9	20 36 56.35	+1 40.42	18 58 37.9	+5 55.0	0.765170	21 32	4 18
11	20 38 36.77	1 39.08	−18 52 42.9	5 53.4	0.763564	21 26	4 18
13	20 40 15.85	1 37.70	18 46 49.5	5 51.5	0.761905	21 20	4 19
15	20 41 53.55	1 36.27	18 40 58.0	5 49.2	0.760193	21 13	4 20
17	20 43 29.82	1 34.80	18 35 8.8	5 46.7	0.758428	21 7	4 20
19	20 45 4.62		18 29 22.1		0.756610	21 1	4 21

Wahrer geocentrischer Ort.

0ʰ Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
März 17	20ʰ 43ᵐ 29ˢ.82	+1ᵐ 34ˢ.80	−18° 35′ 8″.8	+5′ 46″.7	0.758428	21ʰ 7ᵐ	4ʰ 20ᵐ
19	20 45 4.62	1 33.30	18 29 22.1	5 43.9	0.756610	21 1	4 21
21	20 46 37.92	1 31.75	18 23 38.2	5 40.7	0.754743	20 54	4 21
23	20 48 9.67	1 30.17	18 17 57.5	5 37.2	0.752826	20 48	4 22
25	20 49 39.84	+1 28.55	18 12 20.3	+5 33.3	0.750860	20 42	4 23
27	20 51 8.39	1 26.88	−18 6 47.0	5 29.1	0.748845	20 35	4 23
29	20 52 35.27	1 25.16	18 1 17.9	5 24.6	0.746782	20 29	4 24
31	20 54 0.43	1 23.40	17 55 53.3	5 19.6	0.744673	20 22	4 24
April 2	20 55 23.83	1 21.58	17 50 33.7	5 14.2	0.742517	20 16	4 25
4	20 56 45.41	+1 19.72	17 45 19.5	+5 8.5	0.740316	20 9	4 25
6	20 58 5.13	1 17.79	−17 40 11.0	5 2.3	0.738070	20 3	4 26
8	20 59 22.92	1 15.82	17 35 8.7	4 55.8	0.735781	19 56	4 26
10	21 0 38.74	1 13.79	17 30 12.9	4 49.0	0.733450	19 50	4 27
12	21 1 52.53	1 11.73	17 25 23.9	4 41.8	0.731078	19 43	4 28
14	21 3 4.26	+1 9.62	17 20 42.1	+4 34.2	0.728668	19 36	4 28
16	21 4 13.88	1 7.45	−17 16 7.9	4 26.3	0.726220	19 30	4 29
18	21 5 21.33	1 5.26	17 11 41.6	4 18.1	0.723735	19 23	4 29
20	21 6 26.59	1 3.04	17 7 23.5	4 9.6	0.721216	19 16	4 29
22	21 7 29.63	1 0.76	17 3 13.9	4 0.6	0.718664	19 9	4 30
24	21 8 30.39	+0 58.44	16 59 13.3	+3 51.4	0.716081	19 2	4 30
26	21 9 28.83	0 56.07	−16 55 21.9	3 41.7	0.713467	18 55	4 31
28	21 10 24.90	0 53.65	16 51 40.2	3 31.7	0.710825	18 48	4 31
30	21 11 18.55	0 51.18	16 48 8.5	3 21.3	0.708155	18 41	4 31
Mai 2	21 12 9.73	0 48.65	16 44 47.2	3 10.5	0.705461	18 34	4 32
4	21 12 58.38	+0 46.08	16 41 36.7	+2 59.5	0.702744	18 27	4 32
6	21 13 44.46	0 43.45	−16 38 37.2	2 48.0	0.700006	18 20	4 32
8	21 14 27.91	0 40.79	16 35 49.2	2 36.4	0.697249	18 13	4 33
10	21 15 8.70	0 38.07	16 33 12.8	2 24.4	0.694477	18 6	4 33
12	21 15 46.77	0 35.33	16 30 48.4	2 12.1	0.691692	17 59	4 33
14	21 16 22.10	+0 32.56	16 28 36.3	+1 59.6	0.688896	17 51	4 33
16	21 16 54.66	0 29.75	−16 26 36.7	1 47.0	0.686092	17 44	4 34
18	21 17 24.41	0 26.93	16 24 49.7	1 34.1	0.683284	17 37	4 34
20	21 17 51.34	0 24.06	16 23 15.6	1 21.0	0.680474	17 29	4 34
22	21 18 15.40	0 21.17	16 21 54.6	1 7.7	0.677664	17 22	4 34
24	21 18 36.57	+0 18.24	16 20 46.9	+0 54.2	0.674857	17 14	4 34
26	21 18 54.81	0 15.29	−16 19 52.7	0 40.4	0.672057	17 6	4 34
28	21 19 10.10	0 12.30	16 19 12.3	0 26.6	0.669266	16 59	4 34
30	21 19 22.40	0 9.29	16 18 45.7	+0 12.5	0.666488	16 51	4 34
Juni 1	21 19 31.69	0 6.25	16 18 33.2	−0 1.5	0.663726	16 44	4 34
3	21 19 37.94		16 18 34.7		0.660985	16 36	4 34

Wahrer geocentrischer Ort.

0^h Mittl. Zeit		AR. h m s	Diff. m s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tagbogen h m
Juni	1	21 19 31.69	+0 6.25	−16 18 33.2	−0 1.5	0.663726	16 44	4 34
	3	21 19 37.94	0 3.20	16 18 34.7	0 15.7	0.660985	16 36	4 34
	5	21 19 41.14	+0 0.14	16 18 50.4	0 29.9	0.658267	16 28	4 34
	7	21 19 41.28	−0 2.92	16 19 20.3	0 44.0	0.655578	16 20	4 34
	9	21 19 38.36	−0 5.97	16 20 4.3	−0 58.0	0.652921	16 12	4 34
	11	21 19 32.39	0 9.00	−16 21 2.3	1 11.9	0.650300	16 4	4 34
	13	21 19 23.39	0 12.01	16 22 14.2	1 25.7	0.647720	15 56	4 34
	15	21 19 11.38	0 15.00	16 23 39.9	1 39.2	0.645184	15 48	4 34
	17	21 18 56.38	0 17.96	16 25 19.1	1 52.6	0.642697	15 40	4 34
	19	21 18 38.42	−0 20.89	16 27 11.7	−2 5.8	0.640262	15 32	4 34
	21	21 18 17.53	0 23.78	−16 29 17.5	2 18.7	0.637883	15 23	4 33
	23	21 17 53.75	0 26.64	16 31 36.2	2 31.3	0.635565	15 15	4 33
	25	21 17 27.11	0 29.44	16 34 7.5	2 43.5	0.633312	15 7	4 33
	27	21 16 57.67	0 32.21	16 36 51.0	2 55.5	0.631128	14 58	4 33
	29	21 16 25.46	−0 34.90	16 39 46.5	−3 7.1	0.629018	14 50	4 32
Juli	1	21 15 50.56	0 37.53	−16 42 53.6	3 18.1	0.626985	14 42	4 32
	3	21 15 13.03	0 40.08	16 46 11.7	3 28.5	0.625035	14 33	4 32
	5	21 14 32.95	0 42.52	16 49 40.2	3 38.4	0.623171	14 25	4 31
	7	21 13 50.43	0 44.85	16 53 18.6	3 47.6	0.621398	14 16	4 31
	9	21 13 5.58	−0 47.06	16 57 6.2	−3 56.2	0.619720	14 7	4 30
	11	21 12 18.52	0 49.15	−17 1 2.4	4 4.0	0.618141	13 59	4 30
	13	21 11 29.37	0 51.11	17 5 6.4	4 11.2	0.616665	13 50	4 30
	15	21 10 38.26	0 52.94	17 9 17.6	4 17.5	0.615294	13 41	4 29
	17	21 9 45.32	0 54.63	17 13 35.1	4 23.2	0.614032	13 32	4 29
	19	21 8 50.69	−0 56.17	17 17 58.3	−4 28.2	0.612881	13 24	4 28
	21	21 7 54.52	0 57.58	−17 22 26.5	4 32.4	0.611844	13 15	4 28
	23	21 6 56.94	0 58.85	17 26 58.9	4 35.9	0.610923	13 6	4 27
	25	21 5 58.09	0 59.95	17 31 34.8	4 38.5	0.610121	12 57	4 27
	27	21 4 58.14	1 0.88	17 36 13.3	4 40.3	0.609441	12 48	4 26
	29	21 3 57.26	−1 1.64	17 40 53.6	−4 41.3	0.608883	12 39	4 26
	31	21 2 55.62	1 2.23	−17 45 34.9	4 41.4	0.608450	12 30	4 25
Aug.	2	21 1 53.39	1 2.63	17 50 16.3	4 40.6	0.608143	12 21	4 25
	4	21 0 50.76	1 2.82	17 54 56.9	4 39.0	0.607963	12 13	4 24
	6	20 59 47.94	1 2.81	17 59 35.9	4 36.5	0.607912	12 4	4 24
	8	20 58 45.13	−1 2.63	18 4 12.4	−4 33.3	0.607989	11 55	4 24
	10	20 57 42.50	1 2.25	−18 8 45.7	4 29.3	0.608193	11 46	4 23
	12	20 56 40.25	1 1.70	18 13 15.0	4 24.7	0.608523	11 37	4 23
	14	20 55 38.55	1 0.95	18 17 39.7	4 19.2	0.608979	11 28	4 22
	16	20 54 37.60	1 0.04	18 21 58.9	4 13.1	0.609559	11 19	4 22
	18	20 53 37.56		18 26 12.0		0.610261	11 10	4 21

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Aug. 16	20 54 37.60	−1 0.04	−18 21 58.9	−4 13.1	0.609559	11 19	4 22
18	20 53 37.56	0 58.96	18 26 12.0	4 6.5	0.610261	11 10	4 21
20	20 52 38.60	0 57.71	18 30 18.5	3 59.3	0.611084	11 1	4 21
22	20 51 40.89	0 56.30	18 34 17.8	3 51.5	0.612025	10 52	4 20
24	20 50 44.59	−0 54.74	18 38 9.3	−3 43.1	0.613083	10 44	4 20
26	20 49 49.85	0 53.01	−18 41 52.4	3 34.1	0.614255	10 35	4 20
28	20 48 56.84	0 51.13	18 45 26.5	3 24.8	0.615538	10 26	4 19
30	20 48 5.71	0 49.10	18 48 51.3	3 14.9	0.616930	10 17	4 19
Sept. 1	20 47 16.61	0 46.91	18 52 6.2	3 4.7	0.618427	10 9	4 18
3	20 46 29.70	−0 44.58	18 55 10.9	−2 53.9	0.620026	10 0	4 18
5	20 45 45.12	0 42.13	−18 58 4.8	2 42.9	0.621722	9 51	4 18
7	20 45 2.99	0 39.58	19 0 47.7	2 31.7	0.623512	9 43	4 17
9	20 44 23.41	0 36.92	19 3 19.4	2 20.1	0.625393	9 34	4 17
11	20 43 46.49	0 34.16	19 5 39.5	2 8.4	0.627359	9 26	4 17
13	20 43 12.33	−0 31.32	19 7 47.9	−1 56.5	0.629405	9 17	4 17
15	20 42 41.01	0 28.41	−19 9 44.4	1 44.6	0.631527	9 9	4 17
17	20 42 12.60	0 25.46	19 11 29.0	1 32.4	0.633721	9 0	4 16
19	20 41 47.14	0 22.44	19 13 1.4	1 20.2	0.635982	8 52	4 16
21	20 41 24.70	0 19.37	19 14 21.6	1 7.8	0.638307	8 44	4 16
23	20 41 5.33	−0 16.24	19 15 29.4	−0 55.4	0.640691	8 36	4 16
25	20 40 49.09	0 13.08	−19 16 24.8	0 43.0	0.643130	8 27	4 16
27	20 40 36.01	0 9.87	19 17 7.8	0 30.4	0.645621	8 19	4 16
29	20 40 26.14	0 6.63	19 17 38.2	0 17.7	0.648159	8 11	4 16
Oct. 1	20 40 19.51	0 3.37	19 17 55.9	−0 5.1	0.650739	8 3	4 16
3	20 40 16.14	−0 0.11	19 18 1.0	+0 7.5	0.653357	7 55	4 16
5	20 40 16.03	+0 3.17	−19 17 53.5	0 20.0	0.656008	7 48	4 16
7	20 40 19.20	0 6.44	19 17 33.5	0 32.4	0.658688	7 40	4 16
9	20 40 25.64	0 9.68	19 17 1.1	0 44.9	0.661393	7 32	4 16
11	20 40 35.32	0 12.91	19 16 16.2	0 57.3	0.664119	7 24	4 16
13	20 40 48.23	+0 16.11	19 15 18.9	+1 9.5	0.666862	7 17	4 16
15	20 41 4.34	0 19.27	−19 14 9.4	1 21.7	0.669618	7 9	4 16
17	20 41 23.61	0 22.41	19 12 47.7	1 33.7	0.672384	7 1	4 16
19	20 41 46.02	0 25.50	19 11 14.0	1 45.8	0.675157	6 54	4 16
21	20 42 11.52	0 28.56	19 9 28.2	1 57.8	0.677933	6 46	4 17
23	20 42 40.08	+0 31.60	19 7 30.4	+2 9.7	0.680710	6 39	4 17
25	20 43 11.68	0 34.60	−19 5 20.7	2 21.6	0.683484	6 32	4 17
27	20 43 46.28	0 37.56	19 2 59.1	2 33.5	0.686253	6 24	4 17
29	20 44 23.84	0 40.47	19 0 25.6	2 45.2	0.689013	6 17	4 18
31	20 45 4.31	0 43.34	18 57 40.4	2 56.8	0.691761	6 10	4 18
Nov. 2	20 45 47.65		18 54 43.6		0.694495	6 3	4 18

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Oct. 31	20 45 4.31	+0 43.34	−18 57 40.4	+2 56.8	0.691761	6 10	4 18
Nov. 2	20 45 47.65	0 46.16	18 54 43.6	3 8.3	0.694495	6 3	4 18
4	20 46 33.81	0 48.90	18 51 35.3	3 19.7	0.697211	5 56	4 18
6	20 47 22.71	0 51.59	18 48 15.6	3 31.1	0.699907	5 48	4 19
8	20 48 14.30	+0 54.20	18 44 44.5	+3 42.3	0.702581	5 41	4 19
10	20 49 8.50	0 56.76	−18 41 2.2	3 53.3	0.705230	5 34	4 20
12	20 50 5.26	0 59.25	18 37 8.9	4 4.2	0.707851	5 27	4 20
14	20 51 4.51	1 1.67	18 33 4.7	4 15.0	0.710444	5 21	4 20
16	20 52 6.18	1 4.04	18 28 49.7	4 25.8	0.713006	5 14	4 21
18	20 53 10.22	+1 6.34	18 24 23.9	+4 36.4	0.715535	5 7	4 21
20	20 54 16.56	1 8.59	−18 19 47.5	4 47.0	0.718031	5 0	4 22
22	20 55 25.15	1 10.78	18 15 0.5	4 57.6	0.720491	4 53	4 22
24	20 56 35.93	1 12.92	18 10 2.9	5 8.0	0.722914	4 47	4 23
26	20 57 48.85	1 15.00	18 4 54.9	5 18.4	0.725298	4 40	4 23
28	20 59 3.85	+1 17.01	17 59 36.5	+5 28.5	0.727642	4 33	4 24
30	21 0 20.86	1 18.96	−17 54 8.0	5 38.6	0.729943	4 27	4 25
Dec. 2	21 1 39.82	1 20.84	17 48 29.4	5 48.5	0.732201	4 20	4 25
4	21 3 0.66	1 22.65	17 42 40.9	5 58.3	0.734414	4 14	4 26
6	21 4 23.31	1 24.40	17 36 42.6	6 7.9	0.736581	4 7	4 26
8	21 5 47.71	+1 26.07	17 30 34.7	+6 17.4	0.738701	4 1	4 27
10	21 7 13.78	1 27.68	−17 24 17.3	6 26.7	0.740771	3 54	4 28
12	21 8 41.46	1 29.22	17 17 50.6	6 36.0	0.742791	3 48	4 28
14	21 10 10.68	1 30.71	17 11 14.6	6 45.0	0.744762	3 41	4 29
16	21 11 41.39	1 32.14	17 4 29.6	6 54.0	0.746683	3 35	4 30
18	21 13 13.53	+1 33.52	16 57 35.6	+7 2.8	0.748553	3 29	4 30
20	21 14 47.05	1 34.85	−16 50 32.8	7 11.6	0.750370	3 22	4 31
22	21 16 21.90	1 36.12	16 43 21.2	7 20.1	0.752135	3 16	4 32
24	21 17 58.02	1 37.34	16 36 1.1	7 28.6	0.753846	3 10	4 33
26	21 19 35.36	1 38.52	16 28 32.5	7 36.8	0.755503	3 4	4 33
28	21 21 13.88	+1 39.62	16 20 55.7	+7 44.9	0.757105	2 57	4 34
30	21 22 53.50	1 40.66	−16 13 10.8	7 52.9	0.758651	2 51	4 35
32	21 24 34.16	1 41.65	16 5 17.9	8 0.5	0.760141	2 45	4 36
34	21 26 15.81		15 57 17.4		0.761573	2 39	4 37

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tagbogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Jan. 0	19 16 23.18	+1 0.52	−22 6 53.3	+1 42.3	1.042051	0 40	3 57
2	19 17 23.70	1 0.66	22 5 11.0	1 44.1	1.042222	0 33	3 57
4	19 18 24.36	1 0.75	22 3 26.9	1 45.7	1.042352	0 26	3 57
6	19 19 25.11	1 0.80	22 1 41.2	1 47.3	1.042440	0 19	3 57
8	19 20 25.91	+1 0.81	21 59 53.9	+1 48.9	1.042487	0 12	3 58
10	19 21 26.72	1 0.77	−21 58 5.0	1 50.3	1.042492	0 5	3 58
12	19 22 27.49	1 0.68	21 56 14.7	1 51.6	1.042456	23 58	3 58
14	19 23 28.17	1 0.57	21 54 23.1	1 52.8	1.042379	23 52	3 58
16	19 24 28.74	1 0.40	21 52 30.3	1 54.0	1.042260	23 45	3 58
18	19 25 29.14	+1 0.19	21 50 36.3	+1 55.1	1.042100	23 38	3 59
20	19 26 29.33	0 59.96	−21 48 41.2	1 56.0	1.041899	23 31	3 59
22	19 27 29.29	0 59.68	21 46 45.2	1 56.9	1.041657	23 24	3 59
24	19 28 28.97	0 59.37	21 44 48.3	1 57.7	1.041375	23 17	3 59
26	19 29 28.34	0 59.02	21 42 50.6	1 58.4	1.041053	23 10	4 0
28	19 30 27.36	+0 58.64	21 40 52.2	+1 59.0	1.040691	23 3	4 0
30	19 31 26.00	0 58.22	−21 38 53.2	1 59.4	1.040289	22 57	4 0
Febr. 1	19 32 24.22	0 57.76	21 36 53.8	1 59.7	1.039847	22 50	4 0
3	19 33 21.98	0 57.26	21 34 54.1	2 0.0	1.039366	22 43	4 0
5	19 34 19.24	0 56.72	21 32 54.1	2 0.0	1.038845	22 36	4 1
7	19 35 15.96	+0 56.13	21 30 54.1	+2 0.0	1.038285	22 29	4 1
9	19 36 12.09	0 55.51	−21 28 54.1	1 59.8	1.037687	22 22	4 1
11	19 37 7.60	0 54.85	21 26 54.3	1 59.4	1.037051	22 15	4 1
13	19 38 2.45	0 54.15	21 24 54.9	1 59.0	1.036377	22 8	4 2
15	19 38 56.60	0 53.41	21 22 55.9	1 58.3	1.035666	22 1	4 2
17	19 39 50.01	+0 52.65	21 20 57.6	+1 57.7	1.034918	21 54	4 2
19	19 40 42.66	0 51.84	−21 18 59.9	1 56.8	1.034135	21 47	4 2
21	19 41 34.50	0 51.01	21 17 3.1	1 55.8	1.033317	21 40	4 2
23	19 42 25.51	0 50.15	21 15 7.3	1 54.8	1.032464	21 33	4 3
25	19 43 15.66	0 49.25	21 13 12.5	1 53.5	1.031577	21 26	4 3
27	19 44 4.91	+0 48.32	21 11 19.0	+1 52.1	1.030656	21 19	4 3
März 1	19 44 53.23	0 47.35	−21 9 26.9	1 50.6	1.029703	21 12	4 3
3	19 45 40.58	0 46.35	21 7 36.3	1 48.9	1.028717	21 5	4 4
5	19 46 26.93	0 45.31	21 5 47.4	1 47.1	1.027700	20 57	4 4
7	19 47 12.24	0 44.23	21 4 0.3	1 45.1	1.026652	20 50	4 4
9	19 47 56.47	+0 43.13	21 2 15.2	+1 43.0	1.025574	20 43	4 4
11	19 48 39.60	0 41.98	−21 0 32.2	1 40.7	1.024467	20 36	4 4
13	19 49 21.58	0 40.80	20 58 51.5	1 38.2	1.023332	20 29	4 5
15	19 50 2.38	0 39.60	20 57 13.3	1 35.7	1.022170	20 22	4 5
17	19 50 41.98	0 38.37	20 55 37.6	1 33.0	1.020982	20 14	4 5
19	19 51 20.35		20 54 4.6		1.019768	20 7	4 5

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
März 17	19 50 41.98	+0 38.37	−20 55 37.6	+1 33.0	1.020982	20 14	4 5
19	19 51 20.35	0 37.11	20 54 4.6	1 30.3	1.019768	20 7	4 5
21	19 51 57.46	0 35.83	20 52 34.3	1 27.3	1.018530	20 0	4 5
23	19 52 33.29	0 34.53	20 51 7.0	1 24.3	1.017270	19 53	4 5
25	19 53 7.82	+0 33.20	20 49 42.7	+1 21.1	1.015988	19 45	4 6
27	19 53 41.02	0 31.84	−20 48 21.6	1 17.8	1.014685	19 38	4 6
29	19 54 12.86	0 30.46	20 47 3.8	1 14.4	1.013362	19 30	4 6
31	19 54 43.32	0 29.05	20 45 49.4	1 10.8	1.012021	19 23	4 6
April 2	19 55 12.37	0 27.61	20 44 38.6	1 7.1	1.010662	19 16	4 6
4	19 55 39.98	+0 26.15	20 43 31.5	+1 3.3	1.009286	19 8	4 6
6	19 56 6.13	0 24.66	−20 42 28.2	0 59.5	1.007895	19 1	4 6
8	19 56 30.79	0 23.14	20 41 28.7	0 55.4	1.006491	18 53	4 6
10	19 56 53.93	0 21.62	20 40 33.3	0 51.3	1.005074	18 46	4 7
12	19 57 15.55	0 20.07	20 39 42.0	0 47.1	1.003647	18 38	4 7
14	19 57 35.62	+0 18.51	20 38 54.9	+0 42.8	1.002210	18 31	4 7
16	19 57 54.13	0 16.94	−20 38 12.1	0 38.5	1.000766	18 23	4 7
18	19 58 11.07	0 15.37	20 37 33.6	0 34.1	0.999316	18 16	4 7
20	19 58 26.44	0 13.78	20 36 59.5	0 29.7	0.997862	18 8	4 7
22	19 58 40.22	0 12.18	20 36 29.8	0 25.2	0.996404	18 0	4 7
24	19 58 52.40	+0 10.56	20 36 4.6	+0 20.6	0.994944	17 53	4 7
26	19 59 2.96	0 8.94	−20 35 44.0	0 15.9	0.993484	17 45	4 7
28	19 59 11.90	0 7.31	20 35 28.1	0 11.3	0.992026	17 37	4 7
30	19 59 19.21	0 5.68	20 35 16.8	0 6.6	0.990571	17 29	4 7
Mai 2	19 59 24.89	0 4.03	20 35 10.2	+0 1.9	0.989120	17 22	4 7
4	19 59 28.92	+0 2.39	20 35 8.3	−0 2.9	0.987676	17 14	4 7
6	19 59 31.31	+0 0.74	−20 35 11.2	0 7.6	0.986240	17 6	4 7
8	19 59 32.05	−0 0.90	20 35 18.8	0 12.4	0.984814	16 58	4 7
10	19 59 31.15	0 2.54	20 35 31.2	0 17.0	0.983401	16 50	4 7
12	19 59 28.61	0 4.16	20 35 48.2	0 21.7	0.982001	16 42	4 7
14	19 59 24.45	−0 5.77	20 36 9.9	−0 26.3	0.980617	16 34	4 7
16	19 59 18.68	0 7.36	−20 36 36.2	0 30.8	0.979251	16 26	4 7
18	19 59 11.32	0 8.94	20 37 7.0	0 35.4	0.977904	16 18	4 7
20	19 59 2.38	0 10.49	20 37 42.4	0 39.8	0.976578	16 10	4 7
22	19 58 51.89	0 12.04	20 38 22.2	0 44.2	0.975275	16 2	4 7
24	19 58 39.85	−0 13.55	20 39 6.4	−0 48.5	0.973996	15 54	4 7
26	19 58 26.30	0 15.05	−20 39 54.9	0 52.7	0.972744	15 46	4 7
28	19 58 11.25	0 16.53	20 40 47.6	0 56.7	0.971520	15 38	4 7
30	19 57 54.72	0 17.98	20 41 44.3	1 0.8	0.970325	15 30	4 6
Juni 1	19 57 36.74	0 19.39	20 42 45.1	1 4.6	0.969162	15 22	4 6
3	19 57 17.35		20 43 49.7		0.968032	15 13	4 6

Wahrer geocentrischer Ort.

0h Mittl. Zeit		AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
		h m s	m s	° ′ ″	′ ″		h m	h m
Juni	1	19 57 36.74	−0 19.39	−20 42 45.1	−1 4.6	0.969162	15 22	4 6
	3	19 57 17.35	0 20.78	20 43 49.7	1 8.4	0.968032	15 13	4 6
	5	19 56 56.57	0 22.13	20 44 58.1	1 12.1	0.966937	15 5	4 6
	7	19 56 34.44	0 23.44	20 46 10.2	1 15.5	0.965880	14 57	4 6
	9	19 56 11.00	−0 24.69	20 47 25.7	−1 18.7	0.964862	14 49	4 6
	11	19 55 46.31	0 25.89	−20 48 44.4	1 21.8	0.963884	14 40	4 6
	13	19 55 20.42	0 27.04	20 50 6.2	1 24.8	0.962948	14 32	4 6
	15	19 54 53.38	0 28.15	20 51 31.0	1 27.5	0.962056	14 24	4 5
	17	19 54 25.23	0 29.19	20 52 58.5	1 30.0	0.961208	14 15	4 5
	19	19 53 56.04	−0 30.19	20 54 28.5	−1 32.4	0.960406	14 7	4 5
	21	19 53 25.85	0 31.13	−20 56 0.9	1 34.6	0.959652	13 59	4 5
	23	19 52 54.72	0 32.01	20 57 35.5	1 36.6	0.958946	13 50	4 5
	25	19 52 22.71	0 32.84	20 59 12.1	1 38.5	0.958290	13 42	4 4
	27	19 51 49.87	0 33.60	21 0 50.6	1 40.0	0.957684	13 33	4 4
	29	19 51 16.27	−0 34.31	21 2 30.6	−1 41.5	0.957130	13 25	4 4
Juli	1	19 50 41.96	0 34.95	−21 4 12.1	1 42.7	0.956630	13 16	4 4
	3	19 50 7.01	0 35.51	21 5 54.8	1 43.6	0.956184	13 8	4 4
	5	19 49 31.50	0 36.00	21 7 38.4	1 44.4	0.955793	12 59	4 4
	7	19 48 55.50	0 36.41	21 9 22.8	1 45.0	0.955457	12 51	4 3
	9	19 48 19.09	−0 36.74	21 11 7.8	−1 45.2	0.955178	12 43	4 3
	11	19 47 42.35	0 36.99	−21 12 53.0	1 45.3	0.954956	12 34	4 3
	13	19 47 5.36	0 37.18	21 14 38.3	1 45.2	0.954790	12 26	4 3
	15	19 46 28.18	0 37.28	21 16 23.5	1 44.9	0.954682	12 17	4 3
	17	19 45 50.90	0 37.32	21 18 8.4	1 44.4	0.954631	12 8	4 2
	19	19 45 13.58	−0 37.27	21 19 52.8	−1 43.7	0.954637	12 0	4 2
	21	19 44 36.31	0 37.16	−21 21 36.5	1 42.9	0.954701	11 51	4 2
	23	19 43 59.15	0 36.98	21 23 19.4	1 41.8	0.954822	11 43	4 2
	25	19 43 22.17	0 36.73	21 25 1.2	1 40.6	0.955000	11 35	4 2
	27	19 42 45.44	0 36.40	21 26 41.8	1 39.3	0.955235	11 26	4 1
	29	19 42 9.04	−0 35.99	21 28 21.1	−1 37.7	0.955526	11 17	4 1
	31	19 41 33.05	0 35.51	−21 29 58.8	1 35.9	0.955873	11 9	4 1
Aug.	2	19 40 57.54	0 34.95	21 31 34.7	1 34.0	0.956276	11 1	4 1
	4	19 40 22.59	0 34.31	21 33 8.7	1 31.9	0.956734	10 52	4 1
	6	19 39 48.28	0 33.60	21 34 40.6	1 29.7	0.957246	10 44	4 0
	8	19 39 14.68	−0 32.82	21 36 10.3	−1 27.3	0.957811	10 35	4 0
	10	19 38 41.86	0 31.97	−21 37 37.6	1 24.8	0.958429	10 27	4 0
	12	19 38 9.89	0 31.07	21 39 2.4	1 22.3	0.959097	10 18	4 0
	14	19 37 38.82	0 30.10	21 40 24.7	1 19.6	0.959815	10 10	4 0
	16	19 37 8.72	0 29.07	21 41 44.3	1 16.8	0.960581	10 2	4 0
	18	19 36 39.65		21 43 1.1		0.961394	9 53	3 59

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR. h m s	Diff. m s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tag-bogen h m
Aug. 16	19 37 8.72	−0 29.07	−21 41 44.3	−1 16.8	0.960581	10 2	4 0
18	19 36 39.65	0 27.99	21 43 1.1	1 13.9	0.961394	9 53	3 59
20	19 36 11.66	0 26.87	21 44 15.0	1 10.8	0.962253	9 45	3 59
22	19 35 44.79	0 25.69	21 45 25.8	1 7.8	0.963156	9 36	3 59
24	19 35 19.10	−0 24.45	21 46 33.6	−1 4.8	0.964102	9 28	3 59
26	19 34 54.65	0 23.17	−21 47 38.4	1 1.6	0.965090	9 20	3 59
28	19 34 31.48	0 21.83	21 48 40.0	0 58.2	0.966118	9 12	3 59
30	19 34 9.65	0 20.45	21 49 38.2	0 54.8	0.967184	9 3	3 59
Sept. 1	19 33 49.20	0 19.03	21 50 33.0	0 51.3	0.968287	8 55	3 59
3	19 33 30.17	−0 17.56	21 51 24.3	−0 47.8	0.969425	8 47	3 59
5	19 33 12.61	0 16.06	−21 52 12.1	0 44.4	0.970596	8 39	3 58
7	19 32 56.55	0 14.53	21 52 56.5	0 40.8	0.971799	8 31	3 58
9	19 32 42.02	0 12.96	21 53 37.3	0 37.2	0.973031	8 22	3 58
11	19 32 29.06	0 11.38	21 54 14.5	0 33.6	0.974290	8 14	3 58
13	19 32 17.68	−0 9.79	21 54 48.1	−0 29.9	0.975575	8 6	3 58
15	19 32 7.89	0 8.17	−21 55 18.0	0 26.3	0.976883	7 58	3 58
17	19 31 59.72	0 6.53	21 55 44.3	0 22.6	0.978214	7 50	3 58
19	19 31 53.19	0 4.89	21 56 6.9	0 18.9	0.979564	7 42	3 58
21	19 31 48.30	0 3.22	21 56 25.8	0 15.1	0.980933	7 34	3 58
23	19 31 45.08	−0 1.55	21 56 40.9	−0 11.4	0.982319	7 26	3 58
25	19 31 43.53	+0 0.14	−21 56 52.3	0 7.6	0.983719	7 18	3 58
27	19 31 43.67	0 1.83	21 56 59.9	−0 3.8	0.985133	7 11	3 58
29	19 31 45.50	0 3.53	21 57 3.7	0 0.0	0.986558	7 3	3 58
Oct. 1	19 31 49.03	0 5.24	21 57 3.7	+0 3.8	0.987993	6 55	3 58
3	19 31 54.27	+0 6.94	21 56 59.9	+0 7.6	0.989435	6 47	3 58
5	19 32 1.21	0 8.64	−21 56 52.3	0 11.4	0.990882	6 39	3 58
7	19 32 9.85	0 10.32	21 56 40.9	0 15.2	0.992334	6 32	3 58
9	19 32 20.17	0 12.00	21 56 25.7	0 19.0	0.993787	6 24	3 58
11	19 32 32.17	0 13.67	21 56 6.7	0 22.7	0.995240	6 16	3 58
13	19 32 45.84	+0 15.32	21 55 44.0	+0 26.6	0.996692	6 8	3 58
15	19 33 1.16	0 16.95	−21 55 17.4	0 30.3	0.998141	6 1	3 58
17	19 33 18.11	0 18.57	21 54 47.1	0 34.0	0.999585	5 53	3 58
19	19 33 36.68	0 20.16	21 54 13.1	0 37.8	1.001023	5 45	3 58
21	19 33 56.84	0 21.75	21 53 35.3	0 41.6	1.002453	5 38	3 58
23	19 34 18.59	+0 23.31	21 52 53.7	+0 45.3	1.003875	5 31	3 58
25	19 34 41.90	0 24.87	−21 52 8.4	0 49.1	1.005286	5 23	3 58
27	19 35 6.77	0 26.39	21 51 19.3	0 52.9	1.006685	5 16	3 59
29	19 35 33.16	0 27.90	21 50 26.4	0 56.6	1.008071	5 8	3 59
31	19 36 1.06	0 29.39	21 49 29.8	1 0.4	1.009442	5 1	3 59
Nov. 2	19 36 30.45		21 48 29.4		1.010797	4 53	3 59

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	m s	° ′ ″	′ ″		h m	h m
Oct. 31	19 36 1.06	+0 29.39	−21 49 29.8	+1 0.4	1.009442	5 1	3 59
Nov. 2	19 36 30.45	0 30.84	21 48 29.4	1 4.1	1.010797	4 53	3 59
4	19 37 1.29	0 32.26	21 47 25.3	1 7.7	1.012134	4 46	3 59
6	19 37 33.55	0 33.65	21 46 17.6	1 11.4	1.013452	4 39	3 59
8	19 38 7.20	+0 35.01	21 45 6.2	+1 15.0	1.014750	4 31	3 59
10	19 38 42.21	0 36.33	−21 43 51.2	1 18.6	1.016026	4 24	3 59
12	19 39 18.54	0 37.62	21 42 32.6	1 22.2	1.017279	4 17	4 0
14	19 39 56.16	0 38.88	21 41 10.4	1 25.8	1.018509	4 9	4 0
16	19 40 35.04	0 40.10	21 39 44.6	1 29.3	1.019714	4 2	4 0
18	19 41 15.14	+0 41.30	21 38 15.3	+1 32.9	1.020894	3 55	4 0
20	19 41 56.44	0 42.46	−21 36 42.4	1 36.4	1.022048	3 48	4 0
22	19 42 38.90	0 43.59	21 35 6.0	1 39.8	1.023174	3 41	4 0
24	19 43 22.49	0 44.69	21 33 26.2	1 43.3	1.024272	3 33	4 1
26	19 44 7.18	0 45.76	21 31 42.9	1 46.6	1.025341	3 26	4 1
28	19 44 52.94	+0 46.78	21 29 56.3	+1 49.9	1.026379	3 19	4 1
30	19 45 39.72	0 47.78	−21 28 6.4	1 53.3	1.027386	3 12	4 1
Dec. 2	19 46 27.50	0 48.72	21 26 13.1	1 56.7	1.028361	3 5	4 1
4	19 47 16.22	0 49.63	21 24 16.4	1 59.9	1.029303	2 58	4 2
6	19 48 5.85	0 50.49	21 22 16.5	2 3.0	1.030211	2 51	4 2
8	19 48 56.34	+0 51.32	21 20 13.5	+2 6.1	1.031085	2 44	4 2
10	19 49 47.66	0 52.10	−21 18 7.4	2 9.1	1.031924	2 37	4 2
12	19 50 39.76	0 52.84	21 15 58.3	2 12.1	1.032727	2 30	4 3
14	19 51 32.60	0 53.55	21 13 46.2	2 15.1	1.033495	2 23	4 3
16	19 52 26.15	0 54.22	21 11 31.1	2 18.0	1.034226	2 16	4 3
18	19 53 20.37	+0 54.86	21 9 13.1	+2 20.7	1.034921	2 9	4 3
20	19 54 15.23	0 55.46	−21 6 52.4	2 23.5	1.035578	2 2	4 4
22	19 55 10.69	0 56.03	21 4 28.9	2 26.2	1.036198	1 55	4 4
24	19 56 6.72	0 56.55	21 2 2.7	2 28.8	1.036779	1 48	4 4
26	19 57 3.27	0 57.03	20 59 33.9	2 31.4	1.037321	1 41	4 4
28	19 58 0.30	+0 57.48	20 57 2.5	+2 33.8	1.037824	1 34	4 5
30	19 58 57.78	0 57.88	−20 54 28.7	2 36.0	1.038288	1 27	4 5
32	19 59 55.66	0 58.23	20 51 52.7	2 38.3	1.038711	1 20	4 5
34	20 0 53.89		20 49 14.4		1.039094	1 13	4 6

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR. h m s	Diff. s	Decl. ° ′ ″	Diff. ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tag-bogen h m
Jan. 0	17 9 35.90	+30.02	−22 59 36.0	−37.2	1.301952	22 33	3 50
2	17 10 5.92	29.73	23 0 13.2	36.5	1.301683	22 25	3 50
4	17 10 35.65	29.39	23 0 49.7	35.7	1.301391	22 18	3 50
6	17 11 5.04	29.03	23 1 25.4	35.0	1.301076	22 11	3 50
8	17 11 34.07	+28.65	23 2 0.4	−34.2	1.300739	22 3	3 50
10	17 12 2.72	28.24	−23 2 34.6	33.4	1.300379	21 56	3 50
12	17 12 30.96	27.80	23 3 8.0	32.7	1.299998	21 48	3 50
14	17 12 58.76	27.34	23 3 40.7	31.9	1.299595	21 41	3 50
16	17 13 26.10	26.85	23 4 12.6	31.0	1.299171	21 34	3 50
18	17 13 52.95	+26.34	23 4 43.6	−30.2	1.298727	21 26	3 50
20	17 14 19.29	25.81	−23 5 13.8	29.4	1.298262	21 19	3 50
22	17 14 45.10	25.26	23 5 43.2	28.5	1.297778	21 11	3 50
24	17 15 10.36	24.69	23 6 11.7	27.7	1.297275	21 4	3 50
26	17 15 35.05	24.10	23 6 39.4	26.8	1.296753	20 56	3 50
28	17 15 59.15	+23.48	23 7 6.2	−26.0	1.296213	20 49	3 50
30	17 16 22.63	22.85	−23 7 32.2	25.1	1.295655	20 41	3 50
Febr. 1	17 16 45.48	22.19	23 7 57.3	24.2	1.295080	20 34	3 49
3	17 17 7.67	21.51	23 8 21.5	23.3	1.294489	20 26	3 49
5	17 17 29.18	20.81	23 8 44.8	22.5	1.293881	20 19	3 49
7	17 17 49.99	+20.09	23 9 7.3	−21.6	1.293258	20 11	3 49
9	17 18 10.08	19.35	−23 9 28.9	20.7	1.292620	20 4	3 49
11	17 18 29.43	18.59	23 9 49.6	19.8	1.291969	19 56	3 49
13	17 18 48.02	17.82	23 10 9.4	18.9	1.291304	19 49	3 49
15	17 19 5.84	17.03	23 10 28.3	18.1	1.290626	19 41	3 49
17	17 19 22.87	+16.23	23 10 46.4	−17.2	1.289937	19 33	3 49
19	17 19 39.10	15.41	−23 11 3.6	16.3	1.289237	19 26	3 49
21	17 19 54.51	14.59	23 11 19.9	15.5	1.288527	19 18	3 49
23	17 20 9.10	13.75	23 11 35.4	14.5	1.287807	19 11	3 49
25	17 20 22.85	12.91	23 11 49.9	13.7	1.287078	19 3	3 49
27	17 20 35.76	+12.05	23 12 3.6	−12.8	1.286342	18 55	3 49
März 1	17 20 47.81	11.17	−23 12 16.4	12.0	1.285598	18 48	3 49
3	17 20 58.98	10.29	23 12 28.4	11.1	1.284848	18 40	3 49
5	17 21 9.27	9.39	23 12 39.5	10.2	1.284092	18 32	3 49
7	17 21 18.66	8.49	23 12 49.7	9.4	1.283331	18 24	3 49
9	17 21 27.15	+ 7.58	23 12 59.1	− 8.5	1.282567	18 17	3 49
11	17 21 34.73	6.67	−23 13 7.6	7.7	1.281800	18 9	3 49
13	17 21 41.40	5.75	23 13 15.3	6.8	1.281031	18 1	3 49
15	17 21 47.15	4.83	23 13 22.1	6.0	1.280261	17 53	3 49
17	17 21 51.98	3.92	23 13 28.1	5.1	1.279491	17 46	3 49
19	17 21 55.90		23 13 33.2		1.278722	17 38	3 49

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	s	° ′ ″	″		h m	h m
März 17	17 21 51.98	+ 3.92	−23 13 28.1	− 5.1	1.279491	17 46	3 49
19	17 21 55.90	3.00	23 13 33.2	4.3	1.278722	17 38	3 49
21	17 21 58.90	2.08	23 13 37.5	3.4	1.277955	17 30	3 49
23	17 22 0.98	1.17	23 13 40.9	2.6	1.277191	17 22	3 49
25	17 22 2.15	+ 0.26	23 13 43.5	− 1.8	1.276431	17 14	3 49
27	17 22 2.41	− 0.65	−23 13 45.3	1.0	1.275675	17 6	3 49
29	17 22 1.76	1.55	23 13 46.3	− 0.2	1.274924	16 58	3 49
31	17 22 0.21	2.45	23 13 46.5	+ 0.6	1.274180	16 50	3 49
April 2	17 21 57.76	3.34	23 13 45.9	1.5	1.273442	16 43	3 49
4	17 21 54.42	− 4.23	23 13 44.4	+ 2.3	1.272713	16 35	3 49
6	17 21 50.19	5.11	−23 13 42.1	3.2	1.271993	16 27	3 49
8	17 21 45.08	5.98	23 13 38.9	3.9	1.271284	16 19	3 49
10	17 21 39.10	6.83	23 13 35.0	4.7	1.270586	16 11	3 49
12	17 21 32.27	7.67	23 13 30.3	5.5	1.269899	16 3	3 49
14	17 21 24.60	− 8.48	23 13 24.8	+ 6.3	1.269225	15 55	3 49
16	17 21 16.12	9.29	−23 13 18.5	7.1	1.268566	15 47	3 49
18	17 21 6.83	10.07	23 13 11.4	7.8	1.267921	15 39	3 49
20	17 20 56.76	10.84	23 13 3.6	8.7	1.267292	15 31	3 49
22	17 20 45.92	11.58	23 12 54.9	9.4	1.266679	15 22	3 49
24	17 20 34.34	−12.31	23 12 45.5	+10.1	1.266084	15 14	3 49
26	17 20 22.03	13.02	−23 12 35.4	10.9	1.265506	15 6	3 49
28	17 20 9.01	13.70	23 12 24.5	11.6	1.264947	14 58	3 49
30	17 19 55.31	14.37	23 12 12.9	12.3	1.264407	14 50	3 49
Mai 2	17 19 40.94	15.01	23 12 0.6	13.0	1.263887	14 42	3 49
4	17 19 25.93	−15.63	23 11 47.6	+13.7	1.263388	14 34	3 49
6	17 19 10.30	16.22	−23 11 33.9	14.4	1.262911	14 26	3 49
8	17 18 54.08	16.78	23 11 19.5	15.1	1.262456	14 18	3 49
10	17 18 37.30	17.30	23 11 4.4	15.7	1.262024	14 9	3 49
12	17 18 20.00	17.80	23 10 48.7	16.4	1.261616	14 1	3 49
14	17 18 2.20	−18.26	23 10 32.3	+17.0	1.261232	13 53	3 49
16	17 17 43.94	18.70	−23 10 15.3	17.5	1.260873	13 45	3 49
18	17 17 25.24	19.10	23 9 57.8	18.2	1.260539	13 37	3 49
20	17 17 6.14	19.47	23 9 39.6	18.7	1.260231	13 28	3 49
22	17 16 46.67	19.81	23 9 20.9	19.2	1.259948	13 20	3 49
24	17 16 26.86	−20.11	23 9 1.7	+19.6	1.259692	13 12	3 49
26	17 16 6.75	20.39	−23 8 42.1	20.2	1.259463	13 4	3 49
28	17 15 46.36	20.64	23 8 21.9	20.6	1.259261	12 56	3 49
30	17 15 25.72	20.84	23 8 1.3	21.0	1.259086	12 47	3 49
Juni 1	17 15 4.88	21.02	23 7 40.3	21.3	1.258938	12 39	3 49
3	17 14 43.86		23 7 19.0		1.258819	12 31	3 50

Wahrer geocentrischer Ort.

0h Mittl. Zeit		AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
		h m s	s	° ′ ″	″		h m	h m
Juni	1	17 15 4.88	−21.02	−23 7 40.3	+21.3	1.258938	12 39	3 49
	3	17 14 43.86	21.16	23 7 19.0	21.7	1.258819	12 31	3 50
	5	17 14 22.70	21.26	23 6 57.3	22.0	1.258728	12 23	3 50
	7	17 14 1.44	21.32	23 6 35.3	22.2	1.258665	12 14	3 50
	9	17 13 40.12	−21.34	23 6 13.1	+22.5	1.258630	12 6	3 50
	11	17 13 18.78	21.33	−23 5 50.6	22.7	1.258624	11 58	3 50
	13	17 12 57.45	21.28	23 5 27.9	22.8	1.258646	11 50	3 50
	15	17 12 36.17	21.20	23 5 5.1	23.0	1.258697	11 41	3 50
	17	17 12 14.97	21.08	23 4 42.1	23.0	1.258776	11 33	3 50
	19	17 11 53.89	−20.93	23 4 19.1	+23.0	1.258882	11 25	3 50
	21	17 11 32.96	20.75	−23 3 56.1	23.0	1.259016	11 17	3 50
	23	17 11 12.21	20.53	23 3 33.1	22.9	1.259178	11 8	3 50
	25	17 10 51.68	20.29	23 3 10.2	22.8	1.259367	11 0	3 50
	27	17 10 31.39	20.01	23 2 47.4	22.7	1.259583	10 52	3 50
	29	17 10 11.38	−19.70	23 2 24.7	+22.5	1.259826	10 44	3 50
Juli	1	17 9 51.68	19.35	−23 2 2.2	22.2	1.260096	10 36	3 50
	3	17 9 32.33	18.96	23 1 40.0	21.9	1.260392	10 27	3 50
	5	17 9 13.37	18.55	23 1 18.1	21.6	1.260713	10 19	3 50
	7	17 8 54.82	18.10	23 0 56.5	21.2	1.261061	10 11	3 50
	9	17 8 36.72	−17.63	23 0 35.3	+20.7	1.261433	10 3	3 50
	11	17 8 19.09	17.12	−23 0 14.6	20.3	1.261829	9 55	3 50
	13	17 8 1.97	16.59	22 59 54.3	19.7	1.262249	9 46	3 50
	15	17 7 45.38	16.03	22 59 34.6	19.2	1.262692	9 38	3 50
	17	17 7 29.35	15.45	22 59 15.4	18.5	1.263157	9 30	3 51
	19	17 7 13.90	−14.84	22 58 56.9	+17.9	1.263644	9 22	3 51
	21	17 6 59.06	14.21	−22 58 39.0	17.2	1.264153	9 14	3 51
	23	17 6 44.85	13.57	22 58 21.8	16.5	1.264681	9 6	3 51
	25	17 6 31.28	12.90	22 58 5.3	15.7	1.265229	8 58	3 51
	27	17 6 18.38	12.20	22 57 49.6	14.8	1.265796	8 50	3 51
	29	17 6 6.18	−11.49	22 57 34.8	+14.0	1.266383	8 41	3 51
	31	17 5 54.69	10.75	−22 57 20.8	13.1	1.266987	8 33	3 51
Aug.	2	17 5 43.94	9.99	22 57 7.7	12.2	1.267607	8 25	3 51
	4	17 5 33.95	9.22	22 56 55.5	11.3	1.268243	8 17	3 51
	6	17 5 24.73	8.42	22 56 44.2	10.3	1.268895	8 9	3 51
	8	17 5 16.31	−7.62	22 56 33.9	+9.3	1.269561	8 1	3 51
	10	17 5 8.69	6.80	−22 56 24.6	8.2	1.270240	7 53	3 51
	12	17 5 1.89	5.97	22 56 16.4	7.2	1.270932	7 45	3 51
	14	17 4 55.92	5.14	22 56 9.2	6.1	1.271635	7 37	3 51
	16	17 4 50.78	4.29	22 56 3.1	5.0	1.272349	7 29	3 51
	18	17 4 46.49		22 55 58.1		1.273073	7 21	3 51

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR. h m s	Diff. s	Decl. ° ′ ″	Diff. ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tag-bogen h m
Aug. 16	17 4 50.78	− 4.29	−22 56 3.1	+ 5.0	1.272349	7 29	3 51
18	17 4 46.49	3.44	22 55 58.1	3.9	1.273073	7 21	3 51
20	17 4 43.05	2.58	22 55 54.2	2.7	1.273806	7 13	3 51
22	17 4 40.47	1.71	22 55 51.5	1.6	1.274547	7 5	3 51
24	17 4 38.76	− 0.84	22 55 49.9	+ 0.4	1.275296	6 57	3 51
26	17 4 37.92	+ 0.05	−22 55 49.5	− 0.7	1.276051	6 50	3 51
28	17 4 37.97	0.93	22 55 50.2	1.8	1.276812	6 42	3 51
30	17 4 38.90	1.82	22 55 52.0	3.0	1.277577	6 34	3 51
Sept. 1	17 4 40.72	2.72	22 55 55.0	4.1	1.278346	6 26	3 51
3	17 4 43.44	+ 3.62	22 55 59.1	− 5.4	1.279118	6 18	3 51
5	17 4 47.06	4.51	−22 56 4.5	6.5	1.279892	6 10	3 51
7	17 4 51.57	5.40	22 56 11.0	7.7	1.280667	6 2	3 51
9	17 4 56.97	6.28	22 56 18.7	8.8	1.281442	5 55	3 51
11	17 5 3.25	7.17	22 56 27.5	9.9	1.282217	5 47	3 51
13	17 5 10.42	+ 8.05	22 56 37.4	−11.1	1.282989	5 39	3 51
15	17 5 18.47	8.91	−22 56 48.5	12.2	1.283759	5 31	3 51
17	17 5 27.38	9.77	22 57 0.7	13.3	1.284526	5 24	3 51
19	17 5 37.15	10.64	22 57 14.0	14.3	1.285289	5 16	3 51
21	17 5 47.79	11.48	22 57 28.3	15.4	1.286047	5 8	3 51
23	17 5 59.27	+12.32	22 57 43.7	−16.4	1.286799	5 1	3 51
25	17 6 11.59	13.16	−22 58 0.1	17.4	1.287545	4 53	3 51
27	17 6 24.75	13.99	22 58 17.5	18.4	1.288283	4 45	3 51
29	17 6 38.74	14.80	22 58 35.9	19.3	1.289014	4 38	3 51
Oct. 1	17 6 53.54	15.61	22 58 55.2	20.3	1.289736	4 30	3 51
3	17 7 9.15	+16.41	22 59 15.5	−21.2	1.290448	4 22	3 51
5	17 7 25.56	17.18	−22 59 36.7	22.0	1.291150	4 15	3 50
7	17 7 42.74	17.94	22 59 58.7	22.9	1.291840	4 7	3 50
9	17 8 0.68	18.68	23 0 21.6	23.7	1.292519	3 59	3 50
11	17 8 19.36	19.41	23 0 45.3	24.5	1.293185	3 52	3 50
13	17 8 38.77	+20.12	23 1 9.8	−25.2	1.293838	3 44	3 50
15	17 8 58.89	20.82	−23 1 35.0	25.8	1.294477	3 37	3 50
17	17 9 19.71	21.49	23 2 0.8	26.5	1.295102	3 29	3 50
19	17 9 41.20	22.16	23 2 27.3	27.1	1.295712	3 22	3 50
21	17 10 3.36	22.80	23 2 54.4	27.7	1.296306	3 14	3 50
23	17 10 26.16	+23.43	23 3 22.1	−28.2	1.296884	3 7	3 50
25	17 10 49.59	24.04	−23 3 50.3	28.7	1.297446	2 59	3 50
27	17 11 13.63	24.63	23 4 19.0	29.2	1.297990	2 52	3 50
29	17 11 38.26	25.20	23 4 48.2	29.6	1.298516	2 44	3 50
31	17 12 3.46	25.75	23 5 17.8	30.0	1.299024	2 37	3 50
Nov. 2	17 12 29.21		23 5 47.8		1.299513	2 29	3 50

Wahrer geocentrischer Ort.

0h Mittl. Zeit		AR. h m s	Diff. s	Decl. ° ′ ″	Diff. ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tag-bogen h m
Oct.	31	17 12 3.46	+25.75	−23 5 17.8	−30.0	1.299024	2 37	3 50
Nov.	2	17 12 29.21	26.27	23 5 47.8	30.3	1.299513	2 29	3 50
	4	17 12 55.48	26.78	23 6 18.1	30.7	1.299983	2 22	3 50
	6	17 13 22.26	27.25	23 6 48.8	30.9	1.300432	2 14	3 50
	8	17 13 49.51	+27.71	23 7 19.7	−31.1	1.300861	2 7	3 50
	10	17 14 17.22	28.14	−23 7 50.8	31.3	1.301269	2 0	3 49
	12	17 14 45.36	28.54	23 8 22.1	31.4	1.301656	1 52	3 49
	14	17 15 13.90	28.92	23 8 53.5	31.5	1.302022	1 45	3 49
	16	17 15 42.82	29.29	23 9 25.0	31.6	1.302366	1 37	3 49
	18	17 16 12.11	+29.64	23 9 56.6	−31.6	1.302689	1 30	3 49
	20	17 16 41.75	29.95	−23 10 28.2	31.5	1.302989	1 23	3 49
	22	17 17 11.70	30.24	23 10 59.7	31.6	1.303267	1 15	3 49
	24	17 17 41.94	30.50	23 11 31.3	31.5	1.303521	1 8	3 49
	26	17 18 12.44	30.75	23 12 2.8	31.4	1.303752	1 0	3 49
	28	17 18 43.19	+30.97	23 12 34.2	−31.2	1.303960	0 53	3 49
	30	17 19 14.16	31.15	−23 13 5.4	31.0	1.304144	0 46	3 49
Dec.	2	17 19 45.31	31.32	23 13 36.4	30.8	1.304304	0 38	3 49
	4	17 20 16.63	31.45	23 14 7.2	30.6	1.304440	0 31	3 49
	6	17 20 48.08	31.55	23 14 37.8	30.4	1.304552	0 24	3 49
	8	17 21 19.63	+31.63	23 15 8.2	−30.0	1.304640	0 16	3 49
	10	17 21 51.26	31.68	−23 15 38.2	29.7	1.304704	0 9	3 49
	12	17 22 22.94	31.70	23 16 7.9	29.3	1.304743	0 2	3 48
	14	17 22 54.64	31.71	23 16 37.2	28.9	1.304758	23 54	3 48
	16	17 23 26.35	31.69	23 17 6.1	28.5	1.304748	23 47	3 48
	18	17 23 58.04	+31.64	23 17 34.6	−28.2	1.304714	23 39	3 48
	20	17 24 29.68	31.57	−23 18 2.8	27.7	1.304656	23 32	3 48
	22	17 25 1.25	31.47	23 18 30.5	27.3	1.304574	23 25	3 48
	24	17 25 32.72	31.34	23 18 57.8	26.7	1.304467	23 17	3 48
	26	17 26 4.06	31.18	23 19 24.5	26.3	1.304336	23 10	3 48
	28	17 26 35.24	+31.00	23 19 50.8	−25.8	1.304181	23 3	3 48
	30	17 27 6.24	30.78	−23 20 16.6	25.2	1.304002	22 55	3 48
	32	17 27 37.02	30.55	23 20 41.8	24.8	1.303799	22 48	3 48
	34	17 28 7.57		23 21 6.6		1.303572	22 41	3 48

Wahrer geocentrischer Ort.

0^h Mittl. Zeit		AR.	Diff.	Decl.	Diff.	Log Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
		h m s	s	° ′ ″	″		h m	h m
Jan.	0	5 59 15.19	−14.42	+22 15 12.3	+1.6	1.461121	11 23	8 14
	2	5 59 0.77	14.30	22 15 13.9	1.8	1.461215	11 14	8 14
	4	5 58 46.47	14.14	22 15 15.7	2.0	1.461327	11 6	8 14
	6	5 58 32.33	13.97	22 15 17.7	2.0	1.461458	10 58	8 14
	8	5 58 18.36	−13.76	22 15 19.7	+2.1	1.461607	10 50	8 14
	10	5 58 4.60	13.54	+22 15 21.8	2.2	1.461774	10 42	8 14
	12	5 57 51.06	13.30	22 15 24.0	2.3	1.461959	10 34	8 14
	14	5 57 37.76	13.03	22 15 26.3	2.4	1.462161	10 26	8 14
	16	5 57 24.73	12.73	22 15 28.7	2.6	1.462380	10 18	8 14
	18	5 57 12.00	−12.42	22 15 31.3	+2.7	1.462616	10 10	8 14
	20	5 56 59.58	12.09	+22 15 34.0	2.8	1.462868	10 1	8 14
	22	5 56 47.49	11.75	22 15 36.8	2.9	1.463135	9 53	8 14
	24	5 56 35.74	11.38	22 15 39.7	3.1	1.463418	9 45	8 14
	26	5 56 24.36	11.00	22 15 42.8	3.2	1.463716	9 37	8 14
	28	5 56 13.36	−10.59	22 15 46.0	+3.3	1.464029	9 29	8 14
	30	5 56 2.77	10.18	+22 15 49.3	3.4	1.464356	9 21	8 14
Febr.	1	5 55 52.59	9.75	22 15 52.7	3.6	1.464696	9 13	8 14
	3	5 55 42.84	9.30	22 15 56.3	3.7	1.465050	9 5	8 14
	5	5 55 33.54	8.83	22 16 0.0	3.8	1.465417	8 57	8 14
	7	5 55 24.71	− 8.35	22 16 3.8	+4.0	1.465796	8 49	8 14
	9	5 55 16.36	7.85	+22 16 7.8	4.1	1.466187	8 41	8 14
	11	5 55 8.51	7.34	22 16 11.9	4.2	1.466589	8 33	8 14
	13	5 55 1.17	6.82	22 16 16.1	4.3	1.467001	8 25	8 14
	15	5 54 54.35	6.29	22 16 20.4	4.5	1.467424	8 17	8 14
	17	5 54 48.06	− 5.76	22 16 24.9	+4.6	1.467856	8 9	8 14
	19	5 54 42.30	5.21	+22 16 29.5	4.7	1.468297	8 1	8 14
	21	5 54 37.09	4.66	22 16 34.2	4.9	1.468746	7 53	8 14
	23	5 54 32.43	4.10	22 16 39.1	5.0	1.469202	7 45	8 14
	25	5 54 28.33	3.53	22 16 44.1	5.1	1.469665	7 37	8 14
	27	5 54 24.80	− 2.96	22 16 49.2	+5.2	1.470135	7 29	8 14
März	1	5 54 21.84	2.38	+22 16 54.4	5.4	1.470611	7 21	8 14
	3	5 54 19.46	1.80	22 16 59.8	5.5	1.471092	7 13	8 14
	5	5 54 17.66	1.21	22 17 5.3	5.6	1.471578	7 5	8 14
	7	5 54 16.45	0.62	22 17 10.9	5.6	1.472067	6 57	8 14
	9	5 54 15.83	− 0.03	22 17 16.5	+5.8	1.472560	6 49	8 14
	11	5 54 15.80	+ 0.57	+22 17 22.3	5.9	1.473055	6 42	8 14
	13	5 54 16.37	1.16	22 17 28.2	5.9	1.473552	6 34	8 14
	15	5 54 17.53	1.76	22 17 34.1	6.0	1.474051	6 26	8 14
	17	5 54 19.29	2.34	22 17 40.1	6.2	1.474551	6 18	8 14
	19	5 54 21.63		22 17 46.3		1.475051	6 10	8 14

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	s	° ′ ″	″		h m	h m
März 17	5 54 19.29	+ 2.34	+22 17 40.1	+6.2	1.474551	6 18	8 14
19	5 54 21.63	2.93	22 17 46.3	6.2	1.475051	6 10	8 14
21	5 54 24.56	3.51	22 17 52.5	6.2	1.475551	6 2	8 14
23	5 54 28.07	4.09	22 17 58.7	6.2	1.476049	5 54	8 14
25	5 54 32.16	+ 4.67	22 18 4.9	+6.3	1.476546	5 47	8 14
27	5 54 36.83	5.24	+22 18 11.2	6.4	1.477040	5 39	8 14
29	5 54 42.07	5.81	22 18 17.6	6.4	1.477532	5 31	8 14
31	5 54 47.88	6.37	22 18 24.0	6.4	1.478021	5 23	8 14
April 2	5 54 54.25	6.92	22 18 30.4	6.3	1.478507	5 16	8 14
4	5 55 1.17	+ 7.47	22 18 36.7	+6.4	1.478988	5 8	8 14
6	5 55 8.64	8.02	+22 18 43.1	6.3	1.479465	5 0	8 14
8	5 55 16.66	8.55	22 18 49.4	6.3	1.479936	4 52	8 14
10	5 55 25.21	9.08	22 18 55.7	6.2	1.480401	4 44	8 14
12	5 55 34.29	9.60	22 19 1.9	6.2	1.480860	4 37	8 14
14	5 55 43.89	+10.10	22 19 8.1	+6.2	1.481312	4 29	8 14
16	5 55 53.99	10.59	+22 19 14.3	6.1	1.481756	4 21	8 14
18	5 56 4.58	11.08	22 19 20.4	5.9	1.482193	4 14	8 14
20	5 56 15.66	11.55	22 19 26.3	5.9	1.482621	4 6	8 14
22	5 56 27.21	12.00	22 19 32.2	5.8	1.483041	3 58	8 14
24	5 56 39.21	+12.45	22 19 38.0	+5.6	1.483452	3 50	8 14
26	5 56 51.66	12.89	+22 19 43.6	5.5	1.483853	3 43	8 14
28	5 57 4.55	13.32	22 19 49.1	5.4	1.484245	3 35	8 14
30	5 57 17.87	13.73	22 19 54.5	5.3	1.484627	3 27	8 14
Mai 2	5 57 31.60	14.14	22 19 59.8	5.1	1.484998	3 20	8 14
4	5 57 45.74	+14.53	22 20 4.9	+4.9	1.485358	3 12	8 14
6	5 58 0.27	14.90	+22 20 9.8	4.8	1.485706	3 5	8 14
8	5 58 15.17	15.27	22 20 14.6	4.5	1.486043	2 57	8 14
10	5 58 30.44	15.61	22 20 19.1	4.4	1.486368	2 49	8 14
12	5 58 46.05	15.94	22 20 23.5	4.1	1.486681	2 42	8 14
14	5 59 1.99	+16.25	22 20 27.6	+3.9	1.486981	2 34	8 14
16	5 59 18.24	16.56	+22 20 31.5	3.7	1.487269	2 26	8 14
18	5 59 34.80	16.85	22 20 35.2	3.5	1.487543	2 19	8 14
20	5 59 51.65	17.11	22 20 38.7	3.3	1.487804	2 11	8 14
22	6 0 8.76	17.36	22 20 42.0	3.0	1.488051	2 4	8 14
24	6 0 26.12	+17.61	22 20 45.0	+2.7	1.488285	1 56	8 14
26	6 0 43.73	17.84	+22 20 47.7	2.5	1.488505	1 48	8 14
28	6 1 1.57	18.05	22 20 50.2	2.2	1.488711	1 41	8 14
30	6 1 19.62	18.24	22 20 52.4	1.9	1.488903	1 33	8 14
Juni 1	6 1 37.86	18.43	22 20 54.3	1.6	1.489080	1 26	8 14
3	6 1 56.29		22 20 55.9		1.489243	1 18	8 14

Wahrer geocentrischer Ort.

0^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
Juni 1	6h 1m 37.86s	+18.43s	+22° 20′ 54.3″	+1.6″	1.489080	1h 26m	8h 14m
3	6 1 56.29	18.60	22 20 55.9	1.4	1.489243	1 18	8 14
5	6 2 14.89	18.74	22 20 57.3	1.1	1.489390	1 10	8 14
7	6 2 33.63	18.87	22 20 58.4	0.8	1.489523	1 3	8 14
9	6 2 52.50	+18.99	22 20 59.2	+0.6	1.489641	0 55	8 14
11	6 3 11.49	19.09	+22 20 59.8	+0.2	1.489744	0 48	8 14
13	6 3 30.58	19.16	22 21 0.0	0.0	1.489831	0 40	8 14
15	6 3 49.74	19.22	22 21 0.0	−0.4	1.489903	0 33	8 14
17	6 4 8.96	19.28	22 20 59.6	0.6	1.489960	0 25	8 14
19	6 4 28.24	+19.31	22 20 59.0	−1.0	1.490002	0 18	8 14
21	6 4 47.55	19.32	+22 20 58.0	1.2	1.490029	0 10	8 14
23	6 5 6.87	19.33	22 20 56.8	1.5	1.490040	0 2	8 14
25	6 5 26.20	19.31	22 20 55.3	1.7	1.490036	23 55	8 14
27	6 5 45.51	19.28	22 20 53.6	2.1	1.490016	23 47	8 14
29	6 6 4.79	+19.24	22 20 51.5	−2.4	1.489981	23 40	8 14
Juli 1	6 6 24.03	19.18	+22 20 49.1	2.6	1.489931	23 32	8 14
3	6 6 43.21	19.10	22 20 46.5	2.9	1.489865	23 25	8 14
5	6 7 2.31	19.00	22 20 43.6	3.2	1.489784	23 17	8 14
7	6 7 21.31	18.89	22 20 40.4	3.4	1.489688	23 9	8 14
9	6 7 40.20	+18.76	22 20 37.0	−3.7	1.489577	23 2	8 14
11	6 7 58.96	18.61	+22 20 33.3	3.9	1.489451	22 54	8 14
13	6 8 17.57	18.44	22 20 29.4	4.1	1.489310	22 47	8 14
15	6 8 36.01	18.27	22 20 25.3	4.4	1.489154	22 39	8 14
17	6 8 54.28	18.07	22 20 20.9	4.5	1.488984	22 32	8 14
19	6 9 12.35	+17.87	22 20 16.4	−4.8	1.488800	22 24	8 14
21	6 9 30.22	17.65	+22 20 11.6	5.0	1.488601	22 16	8 14
23	6 9 47.87	17.42	22 20 6.6	5.2	1.488388	22 9	8 14
25	6 10 5.29	17.16	22 20 1.4	5.4	1.488162	22 1	8 14
27	6 10 22.45	16.90	22 19 56.0	5.6	1.487922	21 54	8 14
29	6 10 39.35	+16.62	22 19 50.4	−5.7	1.487668	21 46	8 14
31	6 10 55.97	16.32	+22 19 44.7	5.9	1.487401	21 38	8 14
Aug. 2	6 11 12.29	16.01	22 19 38.8	6.0	1.487121	21 31	8 14
4	6 11 28.30	15.68	22 19 32.8	6.1	1.486828	21 23	8 14
6	6 11 43.98	15.34	22 19 26.7	6.3	1.486522	21 16	8 14
8	6 11 59.32	+14.98	22 19 20.4	−6.3	1.486204	21 8	8 14
10	6 12 14.30	14.61	+22 19 14.1	6.4	1.485875	21 0	8 14
12	6 12 28.91	14.23	22 19 7.7	6.4	1.485534	20 53	8 14
14	6 12 43.14	13.84	22 19 1.3	6.6	1.485182	20 45	8 14
16	6 12 56.98	13.43	22 18 54.7	6.6	1.484819	20 37	8 14
18	6 13 10.41		22 18 48.1		1.484445	20 30	8 14

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Oestl. Stunden-Winkel	Halber Tag-bogen
	h m s	s	° ′ ″	″		h m	h m
Aug. 16	6 12 56.98	+13.43	+22 18 54.7	−6.6	1.484819	20 37	8 14
18	6 13 10.41	13.01	22 18 48.1	6.6	1.484445	20 30	8 14
20	6 13 23.42	12.59	22 18 41.5	6.7	1.484061	20 22	8 14
22	6 13 36.01	12.15	22 18 34.8	6.7	1.483667	20 14	8 14
24	6 13 48.16	+11.70	22 18 28.1	−6.6	1.483264	20 7	8 14
26	6 13 59.86	11.24	+22 18 21.5	6.6	1.482851	19 59	8 14
28	6 14 11.10	10.76	22 18 14.9	6.6	1.482430	19 51	8 14
30	6 14 21.86	10.27	22 18 8.3	6.5	1.482000	19 44	8 14
Sept. 1	6 14 32.13	9.77	22 18 1.8	6.5	1.481563	19 36	8 14
3	6 14 41.90	+ 9.27	22 17 55.3	−6.4	1.481118	19 28	8 14
5	6 14 51.17	8.75	+22 17 48.9	6.3	1.480666	19 20	8 14
7	6 14 59.92	8.23	22 17 42.6	6.2	1.480208	19 13	8 14
9	6 15 8.15	7.69	22 17 36.4	6.1	1.479744	19 5	8 14
11	6 15 15.84	7.15	22 17 30.3	6.0	1.479274	18 57	8 14
13	6 15 22.99	+ 6.61	22 17 24.3	−5.8	1.478800	18 49	8 14
15	6 15 29.60	6.06	+22 17 18.5	5.7	1.478321	18 42	8 14
17	6 15 35.66	5.51	22 17 12.8	5.6	1.477838	18 34	8 14
19	6 15 41.17	4.94	22 17 7.2	5.3	1.477352	18 26	8 14
21	6 15 46.11	4.38	22 17 1.9	5.2	1.476863	18 18	8 14
23	6 15 50.49	+ 3.81	22 16 56.7	−5.0	1.476371	18 10	8 14
25	6 15 54.30	3.23	+22 16 51.7	4.9	1.475878	18 3	8 14
27	6 15 57.53	2.65	22 16 46.8	4.6	1.475383	17 55	8 14
29	6 16 0.18	2.07	22 16 42.2	4.3	1.474888	17 47	8 14
Oct. 1	6 16 2.25	1.48	22 16 37.9	4.1	1.474392	17 39	8 14
3	6 16 3.73	+ 0.89	22 16 33.8	−3.9	1.473897	17 31	8 14
5	6 16 4.62	+ 0.31	+22 16 29.9	3.7	1.473403	17 23	8 14
7	6 16 4.93	− 0.28	22 16 26.2	3.4	1.472911	17 15	8 14
9	6 16 4.65	0.86	22 16 22.8	3.2	1.472421	17 8	8 14
11	6 16 3.79	1.45	22 16 19.6	3.0	1.471934	17 0	8 14
13	6 16 2.34	− 2.01	22 16 16.6	−2.7	1.471451	16 52	8 14
15	6 16 0.33	2.59	+22 16 13.9	2.4	1.470972	16 44	8 14
17	6 15 57.74	3.16	22 16 11.5	2.2	1.470497	16 36	8 14
19	6 15 54.58	3.72	22 16 9.3	1.8	1.470028	16 28	8 14
21	6 15 50.86	4.28	22 16 7.5	1.6	1.469565	16 20	8 14
23	6 15 46.58	− 4.84	22 16 5.9	−1.4	1.469109	16 12	8 14
25	6 15 41.74	5.38	+22 16 4.5	1.1	1.468659	16 4	8 14
27	6 15 36.36	5.93	22 16 3.4	0.9	1.468217	15 56	8 14
29	6 15 30.43	6.46	22 16 2.5	0.5	1.467783	15 48	8 14
31	6 15 23.97	6.98	22 16 2.0	0.3	1.467358	15 40	8 14
Nov. 2	6 15 16.99		22 16 1.7		1.466943	15 32	8 14

Wahrer geocentrischer Ort.

0h Mittl. Zeit	AR. h m s	Diff. s	Decl. ° ′ ″	Diff. ″	Log. Δ	Oestl. Stunden-Winkel h m	Halber Tag-bogen h m
Oct. 31	6 15 23.97	− 6.98	+22 16 2.0	−0.3	1.467358	15 40	8 14
Nov. 2	6 15 16.99	7.49	22 16 1.7	0.0	1.466943	15 32	8 14
4	6 15 9.50	7.99	22 16 1.7	+0.2	1.466538	15 24	8 14
6	6 15 1.51	8.47	22 16 1.9	0.4	1.466143	15 16	8 14
8	6 14 53.04	− 8.94	22 16 2.3	+0.7	1.465759	15 8	8 14
10	6 14 44.10	9.40	+22 16 3.0	0.9	1.465388	15 0	8 14
12	6 14 34.70	9.84	22 16 3.9	1.2	1.465029	14 52	8 14
14	6 14 24.86	10.26	22 16 5.1	1.4	1.464683	14 44	8 14
16	6 14 14.60	10.68	22 16 6.5	1.7	1.464350	14 36	8 14
18	6 14 3.92	−11.07	22 16 8.2	+1.9	1.464030	14 28	8 14
20	6 13 52.85	11.46	+22 16 10.1	2.1	1.463725	14 20	8 14
22	6 13 41.39	11.82	22 16 12.2	2.2	1.463434	14 12	8 14
24	6 13 29.57	12.16	22 16 14.4	2.5	1.463158	14 4	8 14
26	6 13 17.41	12.49	22 16 16.9	2.7	1.462898	13 56	8 14
28	6 13 4.92	−12.79	22 16 19.6	+2.9	1.462653	13 47	8 14
30	6 12 52.13	13.08	+22 16 22.5	3.1	1.462425	13 39	8 14
Dec. 2	6 12 39.05	13.34	22 16 25.6	3.3	1.462214	13 31	8 14
4	6 12 25.71	13.58	22 16 28.9	3.4	1.462020	13 23	8 14
6	6 12 12.13	13.80	22 16 32.3	3.5	1.461843	13 15	8 14
8	6 11 58.33	−13.98	22 16 35.8	+3.7	1.461684	13 7	8 14
10	6 11 44.35	14.15	+22 16 39.5	3.9	1.461542	12 59	8 14
12	6 11 30.20	14.30	22 16 43.4	4.0	1.461418	12 51	8 14
14	6 11 15.90	14.43	22 16 47.4	4.1	1.461313	12 43	8 14
16	6 11 1.47	14.53	22 16 51.5	4.2	1.461226	12 34	8 14
18	6 10 46.94	−14.62	22 16 55.7	+4.4	1.461157	12 26	8 14
20	6 10 32.32	14.67	+22 17 0.1	4.5	1.461107	12 18	8 14
22	6 10 17.65	14.71	22 17 4.6	4.6	1.461075	12 10	8 14
24	6 10 2.94	14.71	22 17 9.2	4.7	1.461062	12 2	8 14
26	6 9 48.23	14.70	22 17 13.9	4.7	1.461068	11 54	8 14
28	6 9 33.53	−14.66	22 17 18.6	+4.8	1.461093	11 46	8 14
30	6 9 18.87	14.60	+22 17 23.4	4.9	1.461137	11 37	8 14
32	6 9 4.27	14.50	22 17 28.3	5.0	1.461200	11 29	8 14
34	6 8 49.77		22 17 33.3		1.461281	11 21	8 14

MERCUR 1902.

Mittlere Ekliptik und Aequinoctium 1900.0.

0^h Mittl. Zeit	Log. Rad. v.	Länge in d. Bahn	Red. a. d. Ekl.	Breite	0^h Mittl. Zeit	Log. Rad. v.	Länge in d. Bahn	Red. a. d. Ekl.	Breite
Jan. 4	9.6526	287° 36′	−11′	−6° 5′	Juli 8	9.6149	316° 46′	0′	−7° 0′
9	9.6345	303 4	− 6	6 47	13	9.5852	335 41	+ 8	6 38
14	9.6097	320 8	+ 1	7 0	18	9.5513	357 35	+13	5 19
19	9.5791	339 32	+ 9	6 28	23	9.5180	23 14	+10	−2 50
24	9.5448	2 6	+13	4 57	28	9.4939	52 36	− 2	+0 40
29	9.5125	28 29	+ 8	−2 14	Aug. 2	9.4886	84 6	−12	+4 12
Febr. 3	9.4913	58 26	− 5	+1 22	7	9.5046	114 49	− 9	6 29
8	9.4901	90 1	−13	4 45	12	9.5347	142 20	+ 2	6 58
13	9.5095	120 16	− 7	6 42	17	9.5692	165 59	+11	6 8
18	9.5411	147 4	+ 4	6 54	22	9.6012	186 14	+13	4 35
23	9.5755	170 1	+12	+5 53	27	9.6278	203 54	+ 9	+2 45
28	9.6067	189 43	+12	4 15	Sept. 1	9.6479	219 46	+ 3	+0 54
März 5	9.6321	207 0	+ 8	2 24	6	9.6613	234 28	− 3	−0 53
10	9.6509	222 36	+ 2	+0 33	11	9.6681	248 29	− 9	2 33
15	9.6631	237 8	− 4	−1 13	16	9.6683	262 16	−12	4 1
20	9.6686	251 4	−10	−2 50	21	9.6621	276 16	−13	−5 17
25	9.6677	264 52	−12	4 17	26	9.6492	290 53	−10	6 17
30	9.6602	278 56	−13	5 30	Oct. 1	9.6296	306 38	− 5	6 53
April 4	9.6460	293 44	− 9	6 25	6	9.6035	324 9	+ 3	6 57
9	9.6252	309 46	− 3	6 57	11	9.5718	344 10	+10	6 14
14	9.5979	327 41	+ 5	−6 53	16	9.5373	7 32	+13	−4 27
19	9.5654	348 16	+11	5 59	21	9.5065	34 46	+ 5	−1 30
24	9.5310	12 20	+12	3 59	26	9.4891	65 17	− 8	+2 11
29	9.5019	40 17	+ 3	−0 50	31	9.4928	96 50	−13	5 20
Mai 4	9.4881	71 13	−10	+2 51	Nov. 5	9.5157	126 27	− 5	6 53
9	9.4958	102 37	−12	+5 46	10	9.5487	152 24	+ 7	+6 45
14	9.5215	131 37	− 2	6 58	15	9.5827	174 34	+12	5 33
19	9.5552	156 50	+ 8	6 35	20	9.6128	193 40	+12	3 51
24	9.5888	178 22	+13	5 16	25	9.6368	210 32	+ 7	2 0
29	9.6178	196 59	+11	3 31	30	9.6542	225 51	+ 1	+0 9
Juni 3	9.6406	213 30	+ 6	+1 39	Dec. 5	9.6649	240 12	− 6	−1 35
8	9.6567	228 36	− 1	−0 11	10	9.6690	254 5	−10	3 10
13	9.6661	242 50	− 7	1 53	15	9.6666	267 54	−13	4 34
18	9.6690	256 40	−11	3 27	20	9.6576	282 6	−12	5 44
23	9.6654	270 32	−13	4 48	25	9.6421	297 7	− 8	6 35
28	9.6552	284 50	−12	−5 55	30	9.6198	313 30	− 2	−6 59
Juli 3	9.6384	300 4	− 7	6 42	35	9.5912	331 56	+ 6	6 46
8	9.6149	316 46	0	7 0	40	9.5579	353 13	+12	5 39

$☊ = 47^\circ\ 8'.6; \quad i = 7^\circ\ 0'.17; \quad m = \frac{1}{6000000}$

VENUS 1902.					ERDE 1902.	
Mittl. Ekliptik und Aequin. 1900.0.					Mittl. Aequ. 1900.0.	
0h Mittl. Zeit	Log. Radius v.	Länge in der Bahn	Red. auf d. Eklipt.	Breite	Log. Radius vect.	Länge
Jan. 4	9.8575	78° 3.4	−0.2	+0° 8.1	9.99266	103° 9.5
14	9.8569	94 14.2	−1.8	1 4.4	9.99282	113 21.1
24	9.8565	110 27.1	−2.8	1 55.8	9.99318	123 31.7
Febr. 3	9.8564	126 41.3	−3.0	2 38.0	9.99378	133 41.0
13	9.8564	142 55.8	−2.2	3 7.6	9.99456	143 48.6
23	9.8567	159 9.4	−0.7	+3 22.2	9.99547	153 53.5
März 5	9.8572	175 21.2	+1.0	3 20.8	9.99656	163 55.7
15	9.8579	191 30.4	+2.4	3 3.4	9.99772	173 55.1
25	9.8587	207 36.3	+3.0	2 31.7	9.99893	183 50.8
April 4	9.8595	223 38.6	+2.7	1 48.2	0.00020	193 43.2
14	9.8603	239 37.3	+1.6	+0 56.6	0.00143	203 32.4
24	9.8610	255 32.6	0.0	+0 0.8	0.00261	213 18.1
Mai 4	9.8616	271 24.9	−1.6	−0 54.9	0.00374	223 0.7
14	9.8621	287 15.0	−2.7	1 46.3	0.00472	232 40.8
24	9.8623	303 3.7	−3.0	2 29.6	0.00556	242 18.0
Juni 3	9.8623	318 52.0	−2.4	−3 1.5	0.00627	251 53.3
13	9.8620	334 40.9	−1.1	3 19.8	0.00677	261 27.3
23	9.8616	350 31.2	+0.5	3 22.9	0.00708	270 59.8
Juli 3	9.8610	6 23.9	+2.0	3 10.5	0.00722	280 31.8
13	9.8602	22 19.6	+2.9	2 43.5	0.00712	290 4.0
23	9.8594	38 18.7	+2.9	−2 3.8	0.00682	299 36.4
Aug. 2	9.8586	54 21.5	+2.0	1 14.3	0.00636	309 10.0
12	9.8578	70 27.9	+0.5	−0 18.8	0.00568	318 45.2
22	9.8572	86 37.5	−1.1	+0 38.3	0.00484	328 22.1
Sept. 1	9.8567	102 49.6	−2.4	1 32.6	0.00390	338 1.7
11	9.8564	119 3.4	−3.0	+2 19.6	0.00279	347 44.0
21	9.8564	135 17.9	−2.6	2 55.4	0.00161	357 29.1
Oct. 1	9.8566	151 32.0	−1.4	3 17.3	0.00040	7 17.7
11	9.8570	167 44.8	+0.2	3 23.5	9.99913	17 9.8
21	9.8576	183 55.3	+1.8	3 13.5	9.99790	27 4.9
31	9.8583	200 2.8	+2.8	+2 48.2	9.99675	37 3.6
Nov. 10	9.8591	216 6.8	+3.0	2 9.9	9.99565	47 5.5
20	9.8599	232 7.2	+2.2	1 21.6	9.99469	57 9.9
30	9.8607	248 4.0	+0.8	+0 27.2	9.99391	67 17.1
Dec. 10	9.8614	263 57.6	−0.8	−0 29.0	9.99327	77 26.2
20	9.8619	279 48.7	−2.2	−1 22.9	9.99287	87 36.5
30	9.8622	295 37.9	−3.0	2 10.5	9.99269	97 47.9
40	9.8623	311 26.3	−2.8	2 48.1	9.99271	107 59.6

$\Omega = 75^\circ\ 46'.4$; $i = 3^\circ\ 23'.6$; $m = \frac{1}{408000}$ $\qquad$ $m = \frac{1}{329390}$

MARS 1902.

Mittlere Ekliptik und Aequinoctium 1900.0.

0h Mittl. Zeit		Log. Radius vect.	Länge in der Bahn	Red. auf die Ekliptik	Breite
Jan.	4	0.14241	315° 5.6	—0.1	—1° 50.8
	14	0.14128	321 23.9	+0.1	1 50.9
	24	0.14060	327 43.7	0.3	1 49.7
Febr.	3	0.14036	334 4.3	0.5	1 47.1
	13	0.14058	340 24.9	0.6	1 43.2
	23	0.14125	346 44.8	+0.7	—1 38.0
März	5	0.14236	353 3.1	0.8	1 31.7
	15	0.14389	359 19.1	0.9	1 24.3
	25	0.14581	5 32.2	0.9	1 16.0
April	4	0.14810	11 41.6	0.9	1 6.9
	14	0.15071	17 46.9	+0.8	—0 57.1
	24	0.15361	23 47.6	0.7	0 46.9
Mai	4	0.15676	29 43.3	0.6	0 36.2
	14	0.16011	35 33.7	0.4	0 25.4
	24	0.16363	41 18.6	0.2	0 14.4
Juni	3	0.16726	46 57.8	+0.1	—0 3.5
	13	0.17098	52 31.4	—0.1	+0 7.3
	23	0.17474	57 59.3	0.3	0 17.8
Juli	3	0.17850	63 21.5	0.4	0 28.0
	13	0.18224	68 38.2	0.6	0 37.7
	23	0.18592	73 49.5	—0.7	+0 47.0
Aug.	2	0.18952	78 55.7	0.8	0 55.8
	12	0.19300	83 56.9	0.8	1 4.0
	22	0.19635	88 53.4	0.9	1 11.6
Sept.	1	0.19954	93 45.5	0.9	1 18.5
	11	0.20257	98 33.4	—0.9	+1 24.8
	21	0.20541	103 17.4	0.8	1 30.4
Oct.	1	0.20805	107 57.9	0.8	1 35.4
	11	0.21048	112 35.2	0.7	1 39.6
	21	0.21268	117 9.5	0.6	1 43.2
	31	0.21466	121 41.1	—0.5	+1 46.1
Nov.	10	0.21640	126 10.5	0.4	1 48.4
	20	0.21790	130 37.9	0.3	1 49.9
	30	0.21915	135 3.5	—0.1	1 50.8
Dec.	10	0.22014	139 27.8	0.0	1 51.0
	20	0.22089	143 51.1	+0.2	+1 50.6
	30	0.22137	148 13.6	0.3	1 49.5
	40	0.22160	152 35.6	0.4	1 47.8

$☊ = 48° 46'.8; \quad i = 1° 51'.0; \quad m = \frac{1}{3093500}$

JUPITER 1902.

Mittlere Ekliptik und Aequinoctium 1900.0.

0h Mittl. Zeit	Log. Radius vect.	Länge in der Bahn	Red. auf die Ekliptik	Breite	B_0
Jan. 4	0.711053	293° 53′ 44.″8	−13.″0	−0° 19′ 37.″5	−1.6
14	0.710751	294 44 47.1	13.7	0 20 45.1	1.6
24	0.710449	295 35 53.7	14.4	0 21 52.6	1.7
Febr. 3	0.710148	296 27 4.6	15.1	0 22 59.8	1.7
13	0.709849	297 18 19.7	15.7	0 24 6.9	1.7
23	0.709550	298 9 39.0	−16.4	−0 25 13.7	−1.7
März 5	0.709253	299 1 2.5	17.0	0 26 20.2	1.8
15	0.708956	299 52 30.3	17.6	0 27 26.5	1.8
25	0.708661	300 44 2.3	18.2	0 28 32.6	1.8
April 4	0.708367	301 35 38.5	18.8	0 29 38.3	1.8
14	0.708075	302 27 18.9	−19.4	−0 30 43.7	−1.9
24	0.707784	303 19 3.5	19.9	0 31 48.8	1.9
Mai 4	0.707495	304 10 52.2	20.5	0 32 53.5	1.9
14	0.707207	305 2 45.0	21.0	0 33 57.9	1.9
24	0.706920	305 54 42.0	21.5	0 35 1.9	2.0
Juni 3	0.706636	306 46 43.1	−22.0	−0 36 5.5	−2.0
13	0.706353	307 38 48.2	22.4	0 37 8.7	2.0
23	0.706072	308 30 57.4	22.9	0 38 11.4	2.0
Juli 3	0.705793	309 23 10.7	23.3	0 39 13.7	2.0
13	0.705516	310 15 27.9	23.7	0 40 15.6	2.1
23	0.705241	311 7 49.1	−24.1	−0 41 16.9	−2.1
Aug. 2	0.704968	312 0 14.3	24.4	0 42 17.8	2.1
12	0.704698	312 52 43.4	24.8	0 43 18.1	2.1
22	0.704429	313 45 16.4	25.1	0 44 17.9	2.1
Sept. 1	0.704163	314 37 53.3	25.4	0 45 17.2	2.1
11	0.703900	315 30 34.0	−25.6	−0 46 15.9	−2.2
21	0.703639	316 23 18.6	25.9	0 47 14.0	2.2
Oct. 1	0.703380	317 16 6.9	26.1	0 48 11.5	2.2
11	0.703124	318 8 58.9	26.3	0 49 8.4	2.2
21	0.702871	319 1 54.7	26.4	0 50 4.7	2.2
31	0.702621	319 54 54.2	−26.6	−0 51 0.3	−2.2
Nov. 10	0.702373	320 47 57.2	26.7	0 51 55.3	2.3
20	0.702129	321 41 3.9	26.8	0 52 49.6	2.3
30	0.701887	322 34 14.2	26.9	0 53 43.2	2.3
Dec. 10	0.701648	323 27 28.0	26.9	0 54 36.0	2.3
20	0.701413	324 20 45.2	−26.9	−0 55 28.2	−2.3
30	0.701180	325 14 5.9	26.9	0 56 19.6	2.3
40	0.700951	326 7 30.0	26.8	0 57 10.2	2.3

$\Omega = 99^\circ\ 26'\ 34''.2;\quad i = 1^\circ\ 18'\ 31''.7;\quad m = \frac{1}{1047.355}$

Mittlere Ekliptik und Aequinoctium 1900.0.

0^h Mittl. Zeit	Log. Radius vect.	Länge in der Bahn	Red. auf die Ekliptik	Breite	B_0
SATURN 1902.					
1901 Dec. 25	1.001992	288° 15′ 32″.9	+15″.3	+0° 11′ 50″.6	+2″.6
1902 Febr. 3	1.001832	289 28 2.2	11.2	0 8 42.1	2.7
März 15	1.001660	290 40 34.8	7.1	0 5 33.2	2.9
April 24	1.001476	291 53 11.1	+ 3.0	+0 2 24.0	3.1
Juni 3	1.001281	293 5 51.2	— 1.1	—0 0 45.4	3.3
Juli 13	1.001075	294 18 35.3	5.2	0 3 55.0	3.5
Aug. 22	1.000858	295 31 23.6	9.4	0 7 4.6	3.7
Oct. 1	1.000630	296 44 16.4	13.5	0 10 14.2	3.9
Nov. 10	1.000391	297 57 13.9	17.6	0 13 23.8	4.0
Dec. 20	1.000142	299 10 16.2	21.6	0 16 33.2	4.2
60	0.999882	300 23 23.6	—25.6	—0 19 42.4	+4.4
$\Omega = 112° 47' 10''.9$; $i = 2° 29' 32''.6$; $m = \frac{1}{3501.6}$					
URANUS 1902.					
1901 Dec. 25	1.281596	257° 16′ 20″.6	—1″.2	—0° 3′ 0″.2	+3″.6
1902 Febr. 3	1.281760	257 44 42.7	1.4	0 3 23.1	3.6
März 15	1.281923	258 13 3.4	1.5	0 3 46.0	3.6
April 24	1.282086	258 41 22.7	1.7	0 4 8.9	3.5
Juni 3	1.282249	259 9 40.6	1.8	0 4 31.7	3.5
Juli 13	1.282412	259 37 57.1	2.0	0 4 54.5	3.5
Aug. 22	1.282575	260 6 12.1	2.1	0 5 17.3	3.4
Oct. 1	1.282737	260 34 25.8	2.3	0 5 40.0	3.4
Nov. 10	1.282898	261 2 38.0	2.4	0 6 2.7	3.3
Dec. 20	1.283060	261 30 48.8	2.6	0 6 25.3	3.3
60	1.283221	261 58 58.2	—2.7	—0 6 47.9	+3.3
$\Omega = 73° 29'$; $i = 0° 46' 22''$; $m = \frac{1}{22869}$					
NEPTUN 1902.					
1901 Dec. 25	1.475457	90° 3′ 1″.1	+49″.1	—1° 9′ 31″.2	—1″.3
1902 Febr. 3	1.475470	90 17 30.6	49.1	1 9 10.6	1.3
März 15	1.475484	90 32 0.2	49.0	1 8 50.0	1.3
April 24	1.475498	90 46 29.7	48.9	1 8 29.3	1.3
Juni 3	1.475512	91 0 59.2	48.9	1 8 8.6	1.3
Juli 13	1.475526	91 15 28.8	48.8	1 7 47.7	1.3
Aug. 22	1.475541	91 29 58.4	48.7	1 7 26.8	1.3
Oct. 1	1.475556	91 44 28.0	48.6	1 7 5.8	1.2
Nov. 10	1.475571	91 58 57.6	48.5	1 6 44.7	1.2
Dec. 20	1.475586	92 13 27.3	48.4	1 6 23.6	1.2
60	1.475601	92 27 57.0	+48.3	—1 6 2.4	—1.2
$\Omega = 130° 40'$; $i = 1° 46' 46''$; $m = \frac{1}{19700}$					

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0s.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0".001
			h m s	s		° ' "	"	
α Androm.	1	2.0	0 3 19.197	+ 3.0928	+ 95	+28 32 57.99	+19.895	—156
β Cassiop.	2	2.1	0 3 56.629	+ 3.1759	+ 661	+58 36 32.99	+19.859	—190
[22 Androm.]	337	5.3	0 5 13.511	+ 3.1054	+ 15	+45 31 36.03	+20.030	— 16
γ Pegasi	3	2.6	0 8 11.284	+ 3.0845	— 7	+14 38 19.36	+20.027	— 13
[Br. 6]	338	6.4	0 10 39.069	+ 3.3106	— 192	+76 24 21.79	+20.009	— 21
ι Ceti	4	3.3	0 14 26.043	+ 3.0557	— 32	— 9 22 2.31	+19.981	— 32
12 Ceti	339	6.0	0 25 2.233	+ 3.0609	— 3	— 4 29 55.80	+19.923	— 9
[κ Cassiop.]	5	4.3	0 27 25.519	+ 3.3787	+ 9	+62 23 26.71	+19.887	— 22
ζ Cassiop.	6	4.0	0 31 30.467	+ 3.3208	+ 18	+53 21 27.28	+19.851	— 12
π Androm.	7	4.0	0 31 38.626	+ 3.1927	— 4	+33 10 47.51	+19.861	0
[ε Androm.]	8	4.1	0 33 22.483	+ 3.1610	— 184	+28 46 46.76	+19.589	—251
δ Androm.	9	3.3	0 34 5.152	+ 3.1986	+ 100	+30 19 29.55	+19.754	— 77
α Cassiop.[1])	10	var.	0 34 56.438	+ 3.3772	+ 35	+55 59 59.55	+19.781	— 38
β Ceti	540	2.0	0 38 40.225	+ 3.0122	+ 147	—18 31 28.92	+19.801	+ 34
21 Cassiop.	340	6.0	0 39 9.976	+ 3.8812	— 88	+74 27 8.51	+19.724	— 36
ο Cassiop.	341	5.0	0 39 15.588	+ 3.3233	— 3	+47 44 52.72	+19.742	— 16
ζ Androm.	11	4.1	0 42 8.493	+ 3.1711	— 91	+23 44 2.97	+19.642	— 72
[η Cassiop.]	12	3.8	0 43 9.733	+ 3.5965	+1351	+57 17 47.49	+19.217	—482
[δ Piscium]	342	4.3	0 43 35.778	+ 3.1076	+ 35	+ 7 3 6.13	+19.653	— 37
[Br. 82]	343	6.0	0 44 46.251	+ 3.5952	— 30	+63 42 50.16	+19.651	— 19
γ Cassiop.	13	2.0	0 50 47.261	+ 3.5868	+ 13	+60 11 9.57	+19.546	— 15
μ Androm.	14	4.0	0 51 18.758	+ 3.3185	+ 141	+37 58 4.75	+19.600	+ 49
43 H. Ceph.	344	4.3	0 55 16.227	+ 7.4204	+ 699	+85 43 53.74	+19.461	— 11
ε Piscium	15	4.0	0 57 51.330	+ 3.1089	— 70	+ 7 21 45.72	+19.455	+ 39
[η Ceti]	541	3.1	1 3 39.547	+ 3.0160	+ 125	—10 42 6.39	+19.160	—124
[44 H. Ceph.]	345	5.6	1 3 47.253	+ 5.0196	+ 303	+79 9 7.99	+19.265	— 15
β Androm.	16	2.3	1 4 14.566	+ 3.3471	+ 144	+35 6 4.66	+19.186	— 84
[τ Piscium]	17	4.0	1 6 15.649	+ 3.2935	+ 45	+29 34 10.68	+19.208	— 12
υ Piscium	18	4.1	1 14 4.632	+ 3.2866	— 2	+26 44 56.63	+19.011	— 3
[ψ Cassiop.]	346	5.0	1 19 0.095	+ 4.1807	+ 112	+67 37 6.24	+18.881	+ 9
ϑ Ceti	21	3.0	1 19 7.469	+ 2.9968	— 68	— 8 41 20.12	+18.673	—196
δ Cassiop.	20	2.8	1 19 23.972	+ 3.8886	+ 386	+59 43 34.68	+18.826	— 36
α Ursae min.	19	2.0	1 23 24.298	+25.6296	+1315	+88 47 4.13	+18.737	— 2
η Piscium	22	3.6	1 26 14.221	+ 3.2027	— 2	+14 50 26.30	+18.646	— 3
40 Cassiop.	347	5.6	1 30 40.298	+ 4.7058	— 51	+72 32 26.36	+18.487	— 16

[1]) Gröfse zwischen 2.2 u. 2.8.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0s.001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0".001
υ Persei	23	3.6	1h 31m 58s.356	+3s.6599	+ 45	+48° 7′ 54″.65	+18″.348	−111
43 Cassiop.	348	6.0	1 35 4.409	+4.3833	+ 67	+67 32 50.79	+18.346	− 5
[ν Piscium]	349	4.6	1 36 19.770	+3.1169	− 35	+ 4 59 30.45	+18.311	+ 5
φ Persei	24	4.0	1 37 30.799	+3.7360	+ 11	+50 11 42.08	+18.239	− 25
τ Ceti	542	3.3	1 39 30.844	+2.7842	−1223	−16 27 13.18	+19.046	+857
o Piscium	25	4.1	1 40 12.988	+3.1618	+ 29	+ 8 39 52.59	+18.220	+ 54
Lac. ε Sculpt.	543	5.1	1 41 3.261	+2.8080	+ 79	−25 32 33.30	+18.068	− 66
ζ Ceti	544	3.0	1 46 37.322	+2.9584	+ 3	−10 49 8.81	+17.893	− 28
ε Cassiop.	26	3.3	1 47 20.256	+4.2702	+ 35	+63 11 15.31	+17.872	− 20
α Triang.	27	3.6	1 47 29.576	+3.4095	+ 4	+29 6 5.62	+17.659	−228
[γ Arietis] [1])	28	4	1 48 9.015	+3.2833	+ 35	+18 48 48.43	+17.775	− 86
ξ Piscium	29	4.0	1 48 28.854	+3.1020	+ 4	+ 2 42 13.66	+17.868	+ 20
β Arietis	30	2.8	1 49 13.424	+3.3050	+ 50	+20 19 44.88	+17.716	−102
50 Cassiop.	31	4.0	1 55 3.255	+5.0353	− 111	+71 56 49.95	+17.594	+ 17
υ Ceti	545	4.0	1 55 23.191	+2.8244	+ 65	−21 33 10.25	+17.546	− 18
γ Androm.	32	2.4	1 57 52.781	+3.6641	+ 21	+41 51 34.45	+17.406	− 51
α Arietis	33	2.0	2 1 38.789	+3.3727	+ 127	+22 59 57.34	+17.160	−134
β Triang.	34	3.0	2 3 42.584	+3.5571	+ 118	+34 31 26.03	+17.168	− 33
55 Cassiop.	350	6.1	2 6 47.040	+4.6531	− 20	+66 3 54.66	+17.057	− 4
[6 Persei]	351	6.0	2 7 4.946	+3.9646	+ 348	+50 36 38.29	+16.875	−174
Lac. μ Forn.	546	5.2	2 8 35.465	+2.6411	− 11	−31 11 1.79	+16.968	− 10
[γ Triang.]	352	4.3	2 11 29.121	+3.5535	+ 24	+33 23 39.07	+16.807	− 34
67 Ceti	353	6.0	2 12 5.643	+2.9886	+ 36	− 6 52 24.99	+16.704	−109
[ϑ Arietis]	354	5.6	2 12 40.325	+3.3287	− 23	+19 26 52.64	+16.795	+ 10
o Ceti [2])	35	var.	2 14 23.640	+3.0263	− 22	− 3 25 21.68	+16.473	−230
[ι Cass.] [3])	36	4.1	2 20 58.968	+4.8823	− 46	+66 57 42.92	+16.376	0
ξ² Ceti	37	4.0	2 22 56.803	+3.1839	+ 11	+ 8 1 15.43	+16.275	− 1
36 H. Cass.	38	5.6	2 28 42.340	+5.6132	− 45	+72 23 23.37	+15.988	+ 11
ν Arietis	355	5.6	2 33 14.950	+3.3979	− 19	+21 32 16.29	+15.723	− 11
δ Ceti	39	4.0	2 34 27.511	+3.0718	+ 4	− 0 5 39.47	+15.661	− 7
[Br. 366]	356	6.4	2 36 23.146	+5.0991	+ 2	+67 24 30.32	+15.522	− 39
ϑ Persei	40	4.0	2 37 30.121	+4.0749	+ 330	+48 48 50.62	+15.409	− 93
[35 Arietis]	357	5.0	2 37 41.871	+3.5088	− 19	+27 17 24.85	+15.480	− 9
[γ Ceti] [4])	41	3.3	2 38 13.253	+3.1034	− 114	+ 2 49 22.12	+15.304	−156
π Ceti	547	4.0	2 39 27.433	+2.8520	− 28	−14 16 25.11	+15.382	− 9

[1]) $4^m.3$ u. $4^m.4$. Dupl. 8″.6; AR. der Mitte, Decl. des südl. Sterns.

[2]) Gröfse zwischen 1.7 u. 9. 9^m folgt 8^s im Parallel.

[3]) 7^m 2″; 8^m 7″.5.

[4]) 7^m 3″.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0s.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0".001
			h m s	s		° ′ ″	″	
μ Ceti	42	4.0	2 39 38.495	+3.2358	+ 164	+ 9 42 2.07	+15.361	— 20
[η Persei]	43	3.6	2 43 32.613	+4.3477	+ 23	+55 29 19.30	+15.126	— 34
41 Arietis	44	3.8	2 44 12.746	+3.5206	+ 32	+26 51 24.13	+15.003	—119
τ² Eridani	548	4.6	2 46 35.553	+2.7182	— 62	—21 24 29.28	+14.960	— 23
τ Persei	45	4.0	2 47 18.264	+4.2270	— 18	+52 21 41.60	+14.933	— 9
η Eridani	46	3.0	2 51 38.332	+2.9276	+ 37	— 9 17 16.99	+14.481	—206
47 H. Ceph.	358	6.0	2 53 2.337	+7.7886	— 113	+79 1 54.83	+14.618	+ 15
α Ceti	47	2.3	2 57 9.264	+3.1304	— 29	+ 3 42 19.48	+14.280	— 73
γ Persei	48	3.0	2 57 41.622	+4.3185	— 15	+53 7 22.49	+14.319	— 2
ρ Persei ¹)	49	var.	2 58 53.592	+3.8303	+ 103	+38 27 38.96	+14.160	— 88
β Persei ²)	50	var.	3 1 47.304	+3.8869	— 17	+40 34 41.88	+14.078	+ 10
[ι Persei]	51	4.0	3 1 59.395	+4.3057	+1274	+49 14 21.12	+13.997	— 66
δ Arietis	359	4.1	3 6 1.375	+3.4229	+ 95	+19 21 22.44	+13.804	+ 2
48 H. Ceph.	360	6.1	3 7 51.664	+7.4382	+ 29	+77 22 30.43	+13.639	— 45
12 Eridani ³)	549	3.3	3 7 54.478	+2.5471	+ 245	—29 22 23.92	+14.338	+656
α Persei	52	2.0	3 17 19.328	+4.2619	+ 15	+49 30 45.10	+13.034	— 33
o Tauri	53	3.6	3 19 32.288	+3.2237	— 52	+ 8 41 2.96	+12.852	— 68
2 H. Camel.	361	4.6	3 21 7.660	+4.8240	— 14	+59 35 56.98	+12.825	+ 12
[ξ Tauri]	54	3.6	3 21 51.400	+3.2465	+ 32	+ 9 23 27.43	+12.716	— 49
[σ Persei] ⁴)	362	4.8	3 23 39.705	+4.2115	0	+47 39 25.67	+12.661	+ 19
f Tauri	55	4.0	3 25 27.631	+3.3060	— 2	+12 36 3.71	+12.530	+ 11
ε Eridani	56	3.0	3 28 18.723	+2.8234	— 675	— 9 47 24.27	+12.333	+ 11
[Gr. 716]	363	6.0	3 33 38.723	+5.1664	— 38	+62 53 58.71	+12.010	+ 58
δ Persei	57	3.1	3 35 56.604	+4.2529	+ 12	+47 28 27.74	+11.754	— 37
[o Persei] ⁵)	58	4.0	3 38 10.203	+3.7510	— 16	+31 58 40.62	+11.622	— 10
ν Persei	59	4.0	3 38 32.017	+4.0621	— 15	+42 16 8.57	+11.595	— 12
[δ Eridani]	550	3.0	3 38 33.148	+2.8705	— 81	—10 5 42.74	+12.347	+743
[17 Tauri]	60	4.1	3 39 3.217	+3.5543	— 1	+23 48 19.55	+11.533	— 36
5 H. Camel.	364	4.3	3 40 0.072	+6.2569	— 17	+71 1 49.95	+11.450	— 51
η Tauri	61	3.0	3 41 39.389	+3.5578	— 4	+23 48 8.40	+11.343	— 40
τ⁶ Eridani	551	4.0	3 42 37.852	+2.5794	— 127	—23 32 22.16	+10.781	—530
[27 Tauri]	62	4.0	3 43 19.961	+3.5592	— 3	+23 45 13.73	+11.214	— 47
ζ Persei	63	3.0	3 47 58.172	+3.7619	— 3	+31 35 34.21	+10.921	— 2
9 H. Camel.	365	6.0	3 48 46.545	+5.0837	— 13	+60 49 20.02	+10.863	— 1
ε Persei	64	3.3	3 51 16.460	+4.0134	+ 4	+39 43 37.15	+10.659	— 20

¹) Gröfse zwischen 3.4 u. 4.2.
²) Gröfse zwischen 2.2 u. 3.7.
³) 7.8ᵐ 3″.
⁴) 6ᵐ folgt 2ˢ, 6′.5 nördlich.
⁵) 9ᵐ 1″.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0s.001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0″.001
ξ Persei	65	4.0	3h 52m 36s.221	+ 3s.8824	− 6	+35° 30′ 33″.60	+10″.568	− 13
γ Eridani	552	3.0	3 53 27.363	+ 2.7964	+ 29	−13 47 14.07	+10.412	−106
λ Tauri [1]	66	var.	3 55 14.959	+ 3.3189	− 14	+12 12 48.81	+10.375	− 9
ν Tauri	67	4.0	3 57 56.538	+ 3.1882	+ 1	+ 5 43 2.86	+10.173	− 9
c Persei	69	4.0	4 1 32.596	+ 4.3398	+ 9	+47 27 3.67	+ 9.876	− 33
Gr. 750	68	6.4	4 5 40.108	+17.3427	+ 24	+85 17 47.44	+ 9.608	+ 15
o^1 Eridani	366	4.4	4 7 4.866	+ 2.9256	− 6	− 7 5 34.63	+ 9.570	+ 85
[54 Persei]	367	5.8	4 14 2.684	+ 3.8869	− 31	+34 19 48.95	+ 8.944	+ 1
[γ Tauri]	70	4.0	4 14 12.896	+ 3.4096	+ 73	+15 23 27.64	+ 8.900	− 30
δ Tauri	71	4.0	4 17 16.894	+ 3.4550	+ 66	+17 18 46.27	+ 8.665	− 25
ε Tauri	72	3.6	4 22 53.564	+ 3.4985	+ 70	+18 57 47.69	+ 8.217	− 28
[1 Camel. seq.]	368	6.3	4 24 15.999	+ 4.7393	+ 33	+53 41 53.13	+ 8.125	− 9
α Tauri	73	1	4 30 17.732	+ 3.4379	+ 35	+16 18 44.78	+ 7.465	−184
ν Eridani	74	3.3	4 31 25.224	+ 2.9936	− 23	− 3 33 9.32	+ 7.568	+ 9
53 Eridani	553	4.0	4 33 41.415	+ 2.7437	− 77	−14 29 44.41	+ 7.213	−162
Gr. 848	369	6.1	4 35 38.252	+ 7.9981	+ 95	+75 45 48.00	+ 7.083	−132
τ Tauri	370	4.3	4 36 21.680	+ 3.5959	− 10	+22 46 9.09	+ 7.147	− 9
4 Camelop.	371	5.8	4 39 50.131	+ 4.9793	+ 30	+56 34 59.87	+ 6.716	−155
[μ Eridani]	75	3.6	4 40 36.060	+ 2.9971	− 2	− 3 26 2.77	+ 6.806	− 2
9 Camelop.	76	4.3	4 44 18.126	+ 5.9340	− 27	+66 10 35.43	+ 6.502	− 1
[π^4 Orionis]	77	4.3	4 45 59.127	+ 3.1925	− 10	+ 5 26 15.44	+ 6.366	+ 2
π^5 Orionis	78	4.0	4 49 8.766	+ 3.1231	− 4	+ 2 16 48.96	+ 6.094	− 7
ι Aurigae	79	3.0	4 50 36.640	+ 3.9024	+ 6	+33 0 40.44	+ 5.976	− 3
10 Camelop.	80	4.0	4 54 41.917	+ 5.3219	0	+60 17 57.33	+ 5.623	− 14
ε Aurigae [2]	81	var.	4 54 56.045	+ 4.2966	− 16	+43 40 42.56	+ 5.603	− 14
[ζ Aurigae]	82	4.0	4 55 37.574	+ 4.1867	+ 1	+40 55 59.41	+ 5.552	− 6
ι Tauri	372	5.0	4 57 14.205	+ 3.5825	+ 40	+21 27 0.56	+ 5.383	− 40
η Aurigae	83	3.6	4 59 38.462	+ 4.2010	+ 22	+41 6 8.10	+ 5.159	− 61
ε Leporis	554	3.5	5 1 18.706	+ 2.5375	+ 4	−22 30 9.94	+ 5.011	− 68
β Eridani	84	3.0	5 3 1.881	+ 2.9480	− 66	− 5 12 46.28	+ 4.874	− 59
[λ Eridani]	85	4.0	5 4 27.364	+ 2.8698	− 2	− 8 52 46.20	+ 4.813	+ 1
19 H. Camel.	373	5.0	5 6 23.581	+ 9.8006	−370	+79 7 8.60	+ 4.793	+144
μ Aurigae	374	5.6	5 6 43.182	+ 4.0981	− 47	+38 22 7.00	+ 4.548	− 71
α Aurigae	86	1	5 9 26.895	+ 4.4268	+ 78	+45 53 54.68	+ 3.963	−424
β Orionis	87	1	5 9 49.625	+ 2.8809	− 12	− 8 18 53.14	+ 4.360	+ 5

[1]) Gröſse zwischen 3.4 u. 4.2.

[2]) Gröſse zwischen 3.0 u. 4.5.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0s.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0″.001
			h m s	s		° ′ ″	″	
[τ Orionis]	88	4.0	5 12 50.781	+2.9102	— 31	— 6 57 0.69	+4.098	+ 2
[η Orion. m.][1]	89	3.3	5 19 32.901	+3.0141	— 15	— 2 29 13.63	+3.531	+ 10
γ Orionis	91	2.0	5 19 52.406	+3.2153	— 19	+ 6 15 39.67	+3.478	— 15
β Tauri	90	2.0	5 20 5.758	+3.7902	+ 13	+28 31 29.39	+3.294	—180
17 Camelop.	375	6.0	5 20 54.716	+5.6553	— 15	+62 59 8.18	+3.397	— 6
[β Leporis]	555	3.2	5 24 2.741	+2.5687	— 15	—20 50 14.92	+3.054	— 79
Gr. 966	92	6.5	5 26 37.108	+8.0021	+ 3	+74 58 44.48	+2.886	— 24
δ Orionis [2]	93	var.	5 26 59.928	+3.0628	— 14	— 0 22 17.84	+2.872	— 5
α Leporis	556	3.0	5 28 24.424	+2.6442	— 11	—17 53 32.49	+2.765	+ 10
[φ¹ Orionis]	376	5.0	5 29 26.363	+3.2909	— 18	+ 9 25 23.90	+2.664	— 2
[ϑ¹ Orionis] [3]	94	5.1	5 30 27.527	+2.9435	— 27	— 5 27 14.29	+2.613	+ 35
[ϑ² Orionis]	95	5.0	5 30 34.124	+2.9455	— 1	— 5 28 49.24	+2.582	+ 14
ι Orionis	96	3.1	5 30 38.320	+2.9333	— 7	— 5 58 26.65	+2.569	+ 7
ε Orionis	97	2.0	5 31 14.357	+3.0417	— 18	— 1 15 51.50	+2.516	+ 6
ζ Tauri	98	3.3	5 31 47.230	+3.5836	— 6	+21 4 58.48	+2.437	— 24
[σ Orionis]	99	3.7	5 33 49.508	+3.0096	— 16	— 2 39 23.57	+2.287	+ 2
ο Aurigae	377	5.8	5 38 18.413	+4.6433	— 34	+49 47 0.28	+1.867	— 27
[γ Leporis]	557	3.9	5 40 22.584	+2.4987	—230	—22 28 48.99	+1.348	—366
[130 Tauri]	378	6.0	5 41 43.275	+3.4953	— 26	+17 41 33.99	+1.609	+ 12
ζ Leporis	558	3.6	5 42 30.873	+2.7173	— 18	—14 51 29.94	+1.537	+ 9
κ Orionis	100	2.6	5 43 6.438	+2.8430	— 17	— 9 42 15.40	+1.480	+ 4
[ν Aurigae]	101	4.0	5 44 41.715	+4.1530	— 45	+39 7 12.37	+1.368	+ 31
[δ Leporis]	559	4.0	5 47 6.410	+2.5794	+158	—20 53 15.41	+0.474	—654
α Orionis [4]	102	var.	5 49 51.925	+3.2467	+ 8	+ 7 23 20.60	+0.910	+ 24
δ Aurigae	379	4.1	5 51 27.413	+4.9380	+ 76	+54 16 38.92	+0.632	—116
[η Leporis]	560	3.6	5 51 56.420	+2.7306	— 44	—14 11 7.59	+0.852	+146
β Aurigae	103	2.0	5 52 20.394	+4.3999	— 60	+44 56 15.53	+0.658	— 11
ϑ Aurigae	104	3.0	5 53 2.329	+4.0909	+ 37	+37 12 21.55	+0.530	— 78
[66 Orionis]	380	6.0	5 59 47.679	+3.1675	— 26	+ 4 9 51.51	+0.005	— 13
ν Orionis	382	4.6	6 1 58.581	+3.4252	— 3	+14 46 49.53	—0.186	— 13
[36 Camelop.]	381	5.8	6 2 59.231	+6.0295	— 91	+65 44 16.99	—0.308	— 46
22 H. Camel.	383	4.6	6 8 2.845	+6.6177	— 11	+69 21 16.98	—0.815	—111
η Geminor. [5]	105	var.	6 8 57.737	+3.6221	— 50	+22 32 7.82	—0.787	— 3
[2 Lyncis]	384	4.6	6 10 58.678	+5.2992	+ 1	+59 2 48.47	—0.918	+ 42
μ Geminor.	106	3.0	6 17 1.912	+3.6304	+ 37	+22 33 51.12	—1.590	—101

1) 4^m und 5^m, 1″.
2) Gröfse zwischen 2.2 u. 2.7.
3) Der dritte, südlichste Stern im Trapez.
4) Gröfse zwischen 1 u. 1.4.
5) Gröfse zwischen 3.2 u. 4.2.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von $0^s.0001$	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0″.001
ψ¹ Aurigae	385	5.1	$6^h\ 17^m\ 21^s.110$	$+4^s.6246$	+ 1	$+49°\ 20'\ 17''.28$	$-1''.527$	− 10
β Canis maj.	561	2.6	6 18 23.011	+ 2.6407	− 15	−17 54 25.77	−1.604	+ 3
8 Monocer.	386	4.7	6 18 34.537	+ 3.1798	− 12	+ 4 38 33.85	−1.614	+ 10
10 Monocer.	562	5.0	6 23 7.198	+ 2.9623	− 11	− 4 42 5.45	−2.006	+ 14
8 Lyncis	388	6.0	6 28 44.073	+ 5.4920	−308	+61 34 3.77	−2.781	− 271
23 H. Camel.	387	5.3	6 29 30.989	+10.3201	−265	+79 40 14.67	−3.233	− 657
ξ² Canis maj.	563	5.1	6 30 56.965	+ 2.5154	+ 18	−22 53 13.09	−2.669	+ 31
51 Aurigae	389	6.4	6 31 52.101	+ 4.1595	− 37	+39 28 38.88	−2.873	− 94
γ Geminor.	107	2.3	6 32 3.044	+ 3.4668	+ 23	+16 28 59.27	−2.830	− 35
S Monocer.[1]	108	var.	6 35 34.878	+ 3.3050	− 3	+ 9 59 11.57	−3.101	0
ε Geminor.	109	3.3	6 37 54.157	+ 3.6922	− 18	+25 13 42.30	−3.307	− 5
[ψ⁵ Aurigae]	390	5.8	6 39 40.497	+ 4.3266	− 33	+43 40 30.50	−3.307	+ 147
ξ Geminor.	110	3.6	6 39 47.345	+ 3.3681	− 87	+13 0 4.91	−3.659	− 195
α Canis mj.[2]	564	1	6 40 49.896	+ 2.6441	−372	−16 34 53.80	−4.755	−1199
18 Monocer.	392	5.0	6 42 45.056	+ 3.1285	− 20	+ 2 31 10.06	−3.731	− 12
[43 Camelop.]	391	5.1	6 43 8.452	+ 6.4944	+ 3	+69 0 10.55	−3.715	+ 38
[24 H. Camel.]	393	4.6	6 45 46.867	+ 8.8176	+229	+77 6 9.47	−3.993	− 15
ϑ Geminor.	112	3.3	6 46 19.870	+ 3.9585	− 2	+34 4 47.26	−4.059	− 32
15 Lyncis[3]	394	4.7	6 48 47.608	+ 5.2094	0	+58 33 5.64	−4.361	− 123
ϑ Canis maj.	565	4.3	6 49 38.184	+ 2.7868	−105	−11 54 56.69	−4.312	− 3
51 H. Cephei	111	5.1	6 54 44.104	+29.6161	−417	+87 12 10.65	−4.794	− 51
ε Canis maj.	566	1.6	6 54 46.413	+ 2.3565	− 11	−28 50 19.10	−4.730	+ 17
ζ Gemin.[4]	113	var.	6 58 17.828	+ 3.5609	− 11	+20 42 51.40	−5.046	+ 1
γ Canis maj.	567	4.3	6 59 19.427	+ 2.7129	− 18	−15 29 18.36	−5.136	− 3
δ Canis maj.	568	2.0	7 4 24.365	+ 2.4382	− 15	−26 14 15.48	−5.555	+ 7
63 Aurigae	395	5.0	7 4 54.958	+ 4.1330	+ 30	+39 28 50.88	−5.584	+ 20
[64 Aurigae]	396	6.0	7 11 13.523	+ 4.1819	+ 5	+41 3 27.56	−6.109	+ 23
λ Geminor.	114	3.8	7 12 27.691	+ 3.4504	− 39	+16 43 2.83	−6.261	− 26
δ Geminor.	115	3.3	7 14 16.239	+ 3.5864	− 25	+22 9 47.17	−6.383	+ 3
19 Lync. seq.	397	5.1	7 14 52.334	+ 4.9085	− 40	+55 27 58.82	−6.463	− 28
ι Geminor.	117	4.0	7 19 38.459	+ 3.7311	− 97	+27 59 35.25	−6.904	− 75
Gr. 1308	116	6.0	7 20 41.423	+ 6.2883	+ 26	+68 39 57.23	−6.989	− 74
β Canis min.	118	3.0	7 21 50.195	+ 3.2555	− 42	+ 8 29 13.38	−7.040	− 30
ρ Geminor.	398	4.8	7 22 48.484	+ 3.8623	+ 88	+31 58 47.05	−6.894	+ 195
α Gemin.[5]	119	2	7 28 20.692	+ 3.8348	−151	+32 6 13.48	−7.620	− 78

1) Gröſse zwischen 5.0 u. 5.5.

2) Ort des Schwerpunkts. Die Reduction auf den Hauptstern ist nach Auwers (»Untersuchungen über veränderliche Eigenbewegungen«):

$$1902.0 \quad \Delta\alpha = -0^s.128 \quad \Delta\delta = +0''.81$$
$$1903.0 \quad -0\ .144 \quad +0\ .71$$

3) Dupl. 5^m und 6^m, 0″.5. 4) Gröſse zwischen 3.7 u. 4.5.

5) $2^m.3$ u. $3^m.3$. Dupl. 5″; AR. der Mitte, Decl. des folgenden, hellern Sterns.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0ˢ.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0″.001
			h m s	s		° ′ ″	″	
25 Monocer.	569	5.3	7 32 24.209	+2.9810	— 80	— 3 53 31.18	— 7.834	+ 31
α Can. min.¹)	120	1	7 34 10.344	+3.1430	—474	+ 5 28 34.88	— 9.039	—1027
24 Lyncis	399	5.1	7 34 43.143	+5.0997	— 57	+58 56 23.40	— 8.113	— 59
κ Geminor.	121	3.6	7 38 31.921	+3.6265	— 34	+24 37 59.32	— 8.414	— 55
β Geminor.	122	1.3	7 39 19.210	+3.6768	—481	+28 15 47.20	— 8.474	— 51
π Geminor.	400	6.0	7 41 11.397	+3.8764	— 11	+33 39 23.57	— 8.575	— 6
[26 Lyncis]	402	6.1	7 47 34.708	+4.3829	— 55	+47 49 7.32	— 9.091	— 20
Gr. 1374	401	5.4	7 48 28.235	+7.2611	—109	+74 10 48.38	— 9.174	— 34
[53 Camelop.]	403	6.0	7 53 20.593	+5.1595	— 8	+60 35 33.08	— 9.546	— 28
χ Geminor.	404	5.0	7 57 30.037	+3.6915	— 25	+28 4 9.64	— 9.876	— 39
27 Lyncis	405	4.6	8 1 5.198	+4.5296	— 97	+51 47 22.11	—10.107	+ 2
ι Navis	570	3.0	8 3 22.191	+2.5537	— 75	—24 1 18.18	—10.220	+ 61
Br. 1147	406	5.1	8 7 14.455	+7.6515	+ 33	+76 3 22.93	—10.570	0
20 Navis	571	6.0	8 8 49.700	+2.7572	— 20	—15 29 35.16	—10.696	— 9
β Cancri	123	3.6	8 11 12.056	+3.2561	— 44	+ 9 29 15.91	—10.904	— 41
31 Lyncis	407	5.0	8 16 7.833	+4.1246	+ 5	+43 30 9.51	—11.330	— 107
Br. 1197	124	3.6	8 20 45.798	+2.9984	— 58	— 3 35 11.07	—11.550	+ 7
ο Ursae maj.	125	3.3	8 22 7.602	+5.0197	—193	+61 2 45.68	—11.766	— 111
Gr. 1450	408	6.4	8 26 32.718	+3.9064	—151	+38 21 8.19	—12.175	— 208
η Cancri	409	5.8	8 27 2.577	+3.4751	— 39	+20 46 27.33	—12.048	— 47
[Gr. 1446]	410	6.0	8 28 49.333	+6.7762	— 32	+73 58 21.54	—12.228	— 103
[Gr. 1460]	411	5.6	8 32 1.936	+4.4625	—108	+53 3 18.91	—12.379	— 31
δ Cancri	126	4.0	8 39 6.993	+3.4142	— 26	+18 30 52.99	—13.057	— 226
ι Cancri	127	4.1	8 40 46.143	+3.6399	— 16	+29 7 7.24	—12.974	— 33
[ε Hydrae]	128	3.3	8 41 35.214	+3.1802	—135	+ 6 46 43.24	—13.019	— 23
[σ² Cancri m.]²)	412	5.8	8 48 16.037	+3.6699	+ 20	+30 57 2.40	—13.456	— 21
ζ Hydrae	129	3.3	8 50 12.850	+3.1745	— 73	+ 6 19 7.30	—13.543	+ 19
ι Ursae maj.	130	3.0	8 52 30.110	+4.1286	—441	+48 25 35.69	—13.956	— 246
α Cancri	131	4.0	8 53 7.673	+3.2848	+ 10	+12 14 14.18	—13.771	— 22
[ρ Urs. maj.]	413	5.0	8 53 43.034	+5.4734	— 36	+68 0 42.47	—13.769	+ 16
10 Ursae maj.	132	4.0	8 54 16.850	+3.9099	—401	+42 10 15.08	—14.081	— 258
[Gr. 1501]	414	6.0	8 56 50.011	+4.4288	+ 41	+54 40 13.78	—13.958	+ 24
κ Ursae maj.	133	3.3	8 56 56.301	+4.1159	— 37	+47 32 39.00	—14.056	— 68
σ² Ursae maj.	415	5.0	9 1 46.746	+5.3409	+ 1	+67 31 57.73	—14.353	— 64
[36 Lyncis]	416	5.0	9 7 23.983	+3.9444	+ 3	+43 37 19.03	—14.664	— 35

¹) Ort des Mittelpunkts der Bahn. Die Reduction auf den Ort des sichtbaren Sterns beträgt nach Auwers (»Fundamental-Katalog«):

1902.0	$\Delta\alpha = +0^s.032$	$\Delta\delta = -0''.85$
1903.0	$+0\ .023$	$-0\ .92$

²) Dupl. 6ᵐ.3 und 6ᵐ.8, 1″.5.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0s.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0″.001
			h m s	s		° ′ ″	″	
ϑ Hydrae	134	4.0	9 9 15.964	+3.1237	+ 78	+ 2 43 40.16	—15.051	—309
[38 Lyncis]	135	4.1	9 12 44.903	+3.7467	— 30	+37 13 3.00	—15.060	—114
83 Cancri	417	5.8	9 13 30.791	+3.3543	— 90	+18 7 14.99	—15.129	—139
40 Lyncis	136	3.3	9 15 5.172	+3.6651	— 202	+34 48 25.64	—15.055	+ 28
α Hydrae	138	2.0	9 22 46.298	+2.9483	— 19	— 8 14 0.98	—15.464	+ 52
1 H. Dracon.	137	4.3	9 23 8.654	+8.8915	— 173	+81 45 35.89	—15.555	— 20
h Ursae maj.	139	3.3	9 23 48.454	+4.7750	+ 139	+63 29 25.98	—15.547	+ 26
d Ursae maj.	418	4.6	9 25 49.643	+5.3823	— 118	+70 15 40.98	—15.608	+ 76
ϑ Ursae maj.	140	3.0	9 26 18.401	+4.0367	—1040	+52 7 26.10	—16.276	—561
10 Leon. min.	419	4.8	9 28 13.361	+3.6892	+ 8	+36 49 58.40	—15.824	— 10
[Gr. 1564]	420	5.8	9 33 51.935	+5.2045	— 177	+69 41 1.35	—16.190	— 77
[ο Leonis]	141	3.6	9 35 55.273	+3.2057	— 104	+10 20 18.13	—16.238	— 18
ε Leonis	142	3.0	9 40 17.404	+3.4129	— 43	+24 13 32.28	—16.449	— 8
υ Ursae maj.	143	3.6	9 44 1.591	+4.3023	— 390	+59 29 59.92	—16.776	—148
6 Sextantis	572	6.1	9 46 17.774	+3.0245	+ 5	— 3 47 2.10	—16.749	— 14
[μ Leonis]	144	4.0	9 47 11.464	+3.4187	— 185	+26 28 7.19	—16.825	— 45
Gr. 1586	421	6.0	9 49 37.859	+5.4569	— 229	+73 20 44.83	—16.935	— 41
[19 Leon.min.]	422	5.1	9 51 41.097	+3.6896	— 117	+41 31 21.11	—16.997	— 6
π Leonis	423	5.0	9 55 2.096	+3.1725	— 40	+ 8 30 52.38	—17.156	— 11
η Leonis	145	3.3	10 1 59.557	+3.2782	+ 13	+17 14 26.19	—17.451	+ 2
α Leonis	146	1.3	10 3 9.196	+3.1984	— 182	+12 26 46.81	—17.485	+ 18
λ Hydrae	573	4.0	10 5 48.610	+2.9237	— 148	—11 52 10.36	—17.680	— 65
λ Ursae maj.	147	3.3	10 11 11.347	+3.6342	— 164	+43 24 13.17	—17.892	— 57
ζ Leonis	148	3.0	10 11 14.450	+3.3435	0	+23 54 21.49	—17.820	+ 17
μ Ursae maj.	149	3.0	10 16 29.613	+3.5895	— 83	+41 59 32.80	—18.007	+ 34
30 H. Urs. maj.	424	5.0	10 17 4.155	+4.3731	— 70	+66 3 44.01	—18.078	— 14
[30 H. Camel.]	425	5.0	10 19 10.113	+7.6962	— 523	+83 3 27.11	—18.110	+ 33
μ Hydrae	574	4.0	10 21 21.013	+2.8995	— 98	—16 20 9.51	—18.284	— 61
31 Leon. min.	426	4.3	10 22 13.125	+3.4815	— 112	+37 12 34.79	—18.332	— 77
Lac. α Antliae	575	4.2	10 22 39.944	+2.7387	— 87	—30 34 9.04	—18.272	— 1
36 Ursae maj.	427	5.0	10 24 21.523	+3.8671	— 234	+56 28 59.55	—18.364	— 32
9 H. Dracon.	150	4.6	10 26 46.463	+5.2138	— 150	+76 13 4.63	—18.421	— 5
[ρ Leonis]	151	4.0	10 27 39.109	+3.1621	— 12	+ 9 48 39.78	—18.436	+ 11
[37 Urs. maj.]	428	5.1	10 28 51.132	+3.8936	+ 54	+57 35 15.15	—18.448	+ 39
[35 H. Urs. mj.]	429	5.1	10 36 3.665	+4.3620	+ 28	+69 35 19.39	—18.755	— 32

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0ˢ.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0″.001
			h m s	s		° ′ ″	″	
33 Sextantis	576	6.4	10 36 24.934	+3.0505	—120	— 1 13 34.42	—18.838	—104
[41 Leon.min.]	430	5.3	10 38 5.299	+3.2675	—105	+23 42 5.70	—18.760	+ 26
42 Leon. min.	431	5.0	10 40 25.008	+3.3446	— 36	+31 11 55.46	—18.873	— 17
l Leonis	432	5.1	10 44 6.406	+3.1562	— 15	+11 3 49.66	—18.983	— 20
[ν Hydrae]	577	3.3	10 44 47.305	+2.9567	+ 49	—15 40 50.71	—18.767	+215
[46 Leon.min.]	152	4.0	10 47 49.953	+3.3651	+ 53	+34 44 36.86	—19.313	—246
[Br. 1508]	433	6.0	10 52 7.717	+4.9299	—259	+78 17 43.18	—19.205	— 26
β Ursae maj.	153	2.3	10 55 55.888	+3.6473	+ 86	+56 54 28.39	—19.230	+ 41
α Ursae maj.	154	2.0	10 57 41.098	+3.7379	—179	+62 16 48.50	—19.386	— 71
χ Leonis	434	4.8	10 59 57.692	+3.0951	—255	+ 7 51 57.56	—19.391	— 22
ψ Ursae maj.	155	3.1	11 4 9.404	+3.3888	— 70	+45 1 48.57	—19.496	— 36
β Crateris	578	4.0	11 6 50.174	+2.9450	— 18	—22 17 27.19	—19.604	— 88
δ Leonis	156	2.3	11 8 53.873	+3.1967	+102	+21 3 38.85	—19.671	—115
ϑ Leonis	157	3.3	11 9 5.869	+3.1511	— 59	+15 57 55.41	—19.623	— 63
[Gr. 1757]	435	6.0	11 11 10.692	+3.4003	— 94	+50 0 40.36	—19.612	— 13
[ξ Urs. maj. m.]	158	3.8	11 12 57.327	+3.2068	—367	+32 4 50.29	—20.205	—573
ν Ursae maj.	159	3.3	11 13 11.404	+3.2535	+ 5	+33 37 45.18	—19.584	+ 52
δ Crateris	579	3.3	11 14 26.366	+2.9952	—106	—14 14 53.95	—19.449	+209
σ Leonis	160	4.1	11 16 5.013	+3.0950	— 71	+ 6 33 59.24	—19.686	0
Gr. 1771	436	6.1	11 17 1.767	+3.5864	—173	+64 52 0.41	—19.674	+ 27
[ι Leonis]	161	4.0	11 18 48.892	+3.1279	+ 85	+11 4 8.97	—19.793	— 63
[γ Crateris]	580	4.0	11 19 59.052	+2.9920	— 92	—17 8 44.35	—19.716	+ 32
[58 Urs. maj.]	437	6.0	11 25 13.062	+3.2597	— 62	+43 42 40.18	—19.752	+ 70
λ Draconis	162	3.3	11 25 35.619	+3.6108	— 74	+69 52 19.07	—19.853	— 27
ξ Hydrae	581	4.0	11 28 10.830	+2.9436	—166	—31 18 55.50	—19.885	— 25
υ Leonis	438	4.8	11 31 55.818	+3.0701	— 18	— 0 16 57.59	—19.855	+ 47
3 Draconis	439	5.3	11 37 0.823	+3.3862	— 63	+67 17 14.38	—19.919	+ 33
χ Ursae maj.	163	3.8	11 40 52.691	+3.1833	—145	+48 19 21.97	—19.959	+ 28
β Leonis	164	2.0	11 44 3.665	+3.0622	—356	+15 7 11.84	—20.102	— 98
β Virginis	165	3.3	11 45 35.380	+3.1242	+481	+ 2 19 1.08	—20.275	—262
γ Ursae maj.	166	2.3	11 48 40.714	+3.1743	+ 98	+54 14 22.52	—20.019	+ 8
ο Virginis	167	4.0	12 0 13.035	+3.0565	—159	+ 9 16 38.07	—20.004	+ 49
[Gr. 1852]	440	5.8	12 0 16.559	+3.1097	+442	+77 27 13.31	—20.166	—114
ε Corvi	582	3.0	12 5 4.982	+3.0789	— 59	—22 4 29.51	—20.026	+ 21
4 H. Dracon.	168	4.6	12 7 36.817	+2.8622	+ 13	+78 9 39.19	—20.016	+ 25

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0s.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0″.001
			h m s	s		° ′ ″	″	
δ Ursae maj.	169	3.4	12 10 34.762	+2.9892	+134	+57 34 37.28	−20.028	+ 2
[γ Corvi]	583	2.0	12 10 45.886	+3.0797	−123	−16 59 51.82	−19.996	+ 34
[2 Can. ven.]	441	5.9	12 11 13.049	+3.0179	+ 25	+41 12 20.76	−20.059	− 31
η Virginis	170	3.3	12 14 53.471	+3.0673	− 56	− 0 7 20.49	−20.032	− 22
[6 Can. ven.]	442	5.3	12 21 1.475	+2.9657	− 59	+39 33 43.89	−19.993	− 26
δ Corvi	584	2.3	12 24 47.588	+3.0999	−142	−15 58 12.42	−20.081	−146
20 Comae	443	6.0	12 24 47.987	+3.0193	+ 33	+21 26 19.73	−19.951	− 17
[74 Urs. maj.]	444	5.6	12 25 22.967	+2.8210	− 63	+58 56 41.80	−19.837	+100
8 Can. ven.	445	4.3	12 29 5.396	+2.8558	−649	+41 53 23.41	−19.605	+285
β Corvi	585	2.3	12 29 14.154	+3.1411	− 33	−22 51 18.05	−19.941	− 52
κ Draconis	171	3.3	12 29 18.034	+2.5800	−159	+70 19 41.78	−19.890	− 2
24 Comae seq.	446	5.2	12 30 12.893	+3.0119	− 6	+18 54 59.59	−19.846	+ 31
[γ Virgin. m.][1]	172	3	12 36 41.627	+3.0377	−385	− 0 54 43.41	−19.781	+ 15
76 Ursae maj.	447	6.0	12 37 17.162	+2.6369	− 62	+63 15 3.65	−19.805	− 18
ε Ursae maj.	173	2.0	12 49 43.127	+2.6503	+121	+56 29 28.90	−19.612	− 30
δ Virginis	174	3.0	12 50 39.936	+3.0190	−336	+ 3 55 47.89	−19.610	− 47
12 Can. ven. sq.	175	2.9	12 51 26.664	+2.8111	−220	+38 50 51.44	−19.483	+ 66
8 Draconis	448	5.0	12 51 34.716	+2.4065	+ 30	+65 58 11.65	−19.596	− 51
ε Virginis	176	2.6	12 57 17.908	+2.9863	−192	+11 29 8.82	−19.400	+ 29
ϑ Virginis	449	4.3	13 4 52.441	+3.1012	− 43	− 5 0 57.27	−19.291	− 37
[17 Can. ven.][2]	450	5.6	13 5 33.223	+2.7587	− 83	+39 1 10.58	−19.191	+ 46
43 Comae	177	4.1	13 7 18.073	+2.8032	−605	+28 22 29.51	−18.296	+897
[20 Can. ven.]	451	4.6	13 13 8.930	+2.6940	−129	+41 5 18.21	−19.017	+ 21
γ Hydrae	586	3.2	13 13 35.410	+3.2513	+ 24	−22 39 17.01	−19.065	− 38
ζ Urs. maj. pr.	178	2.1	13 19 58.830	+2.4226	+134	+55 26 13.37	−18.865	− 22
α Virginis	587	1	13 20 1.689	+3.1543	− 44	−10 38 59.77	−18.860	− 18
Gr. 2001	452	5.7	13 23 37.965	+1.5196	− 24	+72 54 1.07	−18.754	− 23
69 H. Urs. maj.	453	5.3	13 24 51.427	+2.2101	− 93	+60 27 5.78	−18.685	+ 8
ζ Virginis	179	3.3	13 29 41.887	+3.0532	−205	− 0 5 41.59	−18.479	+ 56
17 H. Can. ven.	454	5.5	13 30 25.215	+2.6800	+ 43	+37 41 3.48	−18.519	− 7
[Gr. 2029]	455	6.0	13 34 49.692	+1.4349	− 87	+71 44 27.52	−18.349	+ 11
τ Bootis	180	4.6	13 42 36.315	+2.8509	−346	+17 56 42.18	−18.035	+ 40
η Ursae maj.	181	2.0	13 43 40.846	+2.3697	−115	+49 48 8.10	−18.049	− 14
89 Virginis	588	5.0	13 44 32.665	+3.2513	− 87	−17 38 46.84	−18.035	− 33
[i Draconis]	456	5.0	13 48 34.181	+1.7507	− 17	+65 12 25.89	−17.857	− 14

[1]) $3^m.3$ u. $3^m.3$.

[2]) 15 Canum (5.6^m) geht 22^s voran, 2′.2 nördlich.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0s.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0".001
			h m s	s		° ′ ″	″	
η Bootis	182	3.0	13 50 1.111	+2.8565	− 49	+18 53 20.20	−18.130	− 344
τ Virginis	183	4.0	13 56 39.453	+3.0493	− 5	+ 2 1 6.14	−17.543	− 33
11 Bootis	457	6.0	13 56 43.890	+2.7213	− 69	+27 51 35.34	−17.489	+ 18
α Draconis	184	3.3	14 1 44.119	+1.6216	− 92	+64 50 38.93	−17.273	+ 16
d Bootis	458	5.0	14 5 55.788	+2.7369	− 20	+25 33 20.09	−17.181	− 81
κ Virginis	185	4.3	14 7 39.997	+3.1947	− 4	− 9 49 3.96	−16.880	+ 141
4 Ursae min.	459	5.0	14 9 13.258	−0.3045	−137	+78 0 29.12	−16.912	+ 36
ι Virginis	186	4.0	14 10 52.393	+3.1396	− 31	− 5 31 59.15	−17.288	− 417
α Bootis	187	1	14 11 11.429	+2.7333	−799	+19 41 33.32	−18.831	−1977
λ Bootis	188	4.0	14 12 39.481	+2.2811	−199	+46 32 17.10	−16.634	+ 151
[ι ~~Virginis~~]	189	4.3	14 12 41.753	+2.1260	−165	+51 49 8.64	−16.698	+ 85
ϑ Bootis	190	3.8	14 21 51.614	+2.0414	−273	+52 18 12.94	−16.727	− 397
[φ Virginis]	191	5.0	14 23 9.097	+3.0870	−102	− 1 47 19.95	−16.267	− 2
ρ Bootis	192	3.6	14 27 36.394	+2.5857	− 85	+30 48 5.16	−15.910	+ 125
γ Bootis	193	2.9	14 28 7.904	+2.4160	−108	+38 44 12.11	−15.854	+ 153
[Gr. 2125]	460	6.0	14 29 3.083	+1.6237	− 93	+60 39 24.92	−15.984	− 26
[33 Bootis]	461	5.6	14 35 11.398	+2.2329	− 72	+44 49 37.06	−15.684	− 56
π Bootis pr.	194	4.3	14 36 7.166	+2.8168	− 12	+16 50 16.45	−15.596	− 20
[ζ Bootis m.][1])	195	3.3	14 36 28.062	+2.8621	+ 19	+14 8 54.74	−15.567	− 10
μ Virginis	196	4.0	14 37 53.627	+3.1561	+ 56	− 5 13 56.34	−15.784	− 305
109 Virginis	197	3.6	14 41 17.560	+3.0285	− 94	+ 2 18 20.25	−15.314	− 27
[8 Librae]	589	6.0	14 45 15.801	+3.3092	− 98	−15 35 25.31	−15.150	− 90
α Librae	590	2.3	14 45 27.279	+3.3107	− 93	−15 38 5.74	−15.121	− 72
Gr. 2164	462	5.8	14 48 57.082	+1.5188	−167	+59 41 32.58	−14.676	+ 169
β Ursae min.	198	2.0	14 50 59.134	−0.2192	− 76	+74 33 21.24	−14.731	− 5
P. XIV, 221	463	6.0	14 51 35.696	+2.8302	− 14	+14 50 32.45	−14.668	+ 20
[2 H. Urs. min.]	464	5.0	14 56 1.601	+0.9473	− 74	+66 19 22.78	−14.363	+ 59
β Bootis	199	3.0	14 58 15.259	+2.2587	− 48	+40 46 36.84	−14.321	− 36
γ Scorpii	591	3.4	14 58 19.895	+3.5013	− 70	−24 53 49.38	−14.315	− 33
ψ Bootis	465	4.3	15 0 14.748	+2.5692	−145	+27 19 46.23	−14.170	− 8
[ι Librae]	592	4.6	15 6 37.996	+3.4118	− 37	−19 25 16.41	−13.805	− 42
[3 Serpentis]	466	5.8	15 10 19.048	+2.9792	− 20	+ 5 18 10.43	−13.523	+ 3
δ Bootis	201	3.0	15 11 33.126	+2.4188	+ 69	+33 40 49.16	−13.552	− 105
β Librae	200	2.0	15 11 43.902	+3.2224	− 79	− 9 1 17.65	−13.451	− 17
1 H. Urs. min.	467	5.3	15 13 30.571	+0.6701	+366	+67 43 7.64	−13.712	− 391

[1]) Dupl. $3^{m}.8$ u. $4^{m}.2$, 1″.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0ˢ.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0″.001
			h m s	s		° ′ ″	″	
μ Bootis	202	3.8	15 20 47.208	+2.2637	−147	+37 43 14.04	−12.751	+ 84
γ Ursae min.	203	3.0	15 20 53.056	−0.1198	+ 40	+72 10 57.92	−12.811	+ 19
[τ¹ Serpentis]	468	5.4	15 21 14.578	+2.7783	− 39	+15 46 21.45	−12.800	+ 5
ι Draconis	204	3.0	15 22 44.860	+1.3282	− 20	+59 18 33.62	−12.682	+ 22
β Coron. bor.	205	3.8	15 23 47.330	+2.4733	−134	+29 26 35.33	−12.559	+ 75
ν¹ Bootis	206	4.5	15 27 24.557	+2.1540	+ 5	+41 10 0.64	−12.400	− 14
[ν² Bootis]	207	4.8	15 28 16.441	+2.1453	− 34	+41 13 54.00	−12.342	− 17
[ϑ Coron. bor.]	208	4.0	15 28 58.527	+2.4147	− 55	+31 41 22.56	−12.297	− 20
γ Librae	593	4.3	15 30 2.582	+3.3501	+ 37	−14 27 46.05	−12.186	+ 19
α Coron. bor.	209	2.0	15 30 32.299	+2.5389	+ 85	+27 2 39.33	−12.264	− 94
[φ Bootis]	469	5.0	15 34 18.460	+2.1536	+ 51	+40 40 19.74	−11.852	+ 53
[ζ Cor. bor. sq.]	210	4.3	15 35 41.166	+2.2565	− 36	+36 57 13.64	−11.806	0
[γ Coron. bor.]	211	3.8	15 38 37.627	+2.5184	− 82	+26 36 20.55	−11.566	+ 34
α Serpentis	212	2.3	15 39 26.381	+2.9516	+ 79	+ 6 44 1.31	−11.486	+ 56
β Serpentis	213	3.3	15 41 39.795	+2.7658	+ 29	+15 43 42.11	−11.423	− 41
κ Serpentis	215	4.0	15 44 19.692	+2.6988	− 39	+18 26 38.55	−11.272	− 83
μ Serpentis	214	3.3	15 44 30.235	+3.1257	− 78	− 3 7 49.47	−11.180	− 3
[12 H. Dracon.]	470	5.3	15 45 10.338	+0.9064	+ 70	+62 54 8.19	−11.190	− 63
ε Serpentis	216	3.3	15 45 55.754	+2.9865	+ 68	+ 4 46 20.60	−11.014	+ 59
ζ Ursae min.	217	4.3	15 47 32.688	−2.2357	+ 30	+78 5 46.01	−10.959	− 4
[γ Serpentis]	218	3.6	15 51 55.507	+2.7673	+194	+15 58 52.37	−11.918	−1286
ε Coron. bor.	219	4.0	15 53 31.764	+2.4813	− 74	+27 9 41.05	−10.573	− 62
δ Scorpii	594	2.3	15 54 32.208	+3.5401	− 18	−22 20 35.44	−10.465	− 28
[Gr. 2296]	471	5.1	15 55 27.644	+1.4117	−254	+55 1 35.11	−10.263	+ 103
β Scorpii	595	2.0	15 59 44.185	+3.4808	− 26	−19 32 15.62	−10.074	− 27
ϑ Draconis	220	3.6	16 0 3.262	+1.1220	−371	+58 49 36.89	− 9.676	+ 344
[φ Herculis]	221	4.0	16 5 40.599	+1.8811	−100	+45 11 30.01	− 9.549	+ 43
δ Ophiuchi	222	3.0	16 9 12.493	+3.1390	− 49	− 3 26 32.00	− 9.458	− 137
ε Ophiuchi	223	3.3	16 13 8.067	+3.1699	+ 40	− 4 27 14.55	− 8.981	+ 34
19 Ursae min.	472	5.8	16 13 36.490	−1.7711	− 50	+76 7 27.53	− 8.975	+ 3
τ Herculis	224	3.3	16 16 47.540	+1.7975	− 50	+46 32 47.46	− 8.691	+ 36
γ Herculis	225	3.1	16 17 35.746	+2.6438	− 49	+19 22 58.91	− 8.616	+ 48
[η Ursae min.]	474	5.1	16 20 21.763	−1.8023	−196	+75 58 52.83	− 8.192	+ 253
[ω Herculis]	473	5.0	16 20 53.402	+2.7613	− 30	+14 15 31.69	− 8.436	− 33
[Gr. 2343]	475	5.6	16 22 16.767	+1.3107	+ 40	+55 25 39.33	− 8.305	− 12

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			h m s	s		° ′ ″	″	
η Draconis	226	2.6	16 22 40.108	+0.8133	+ 60	+61 44 8.86	−8.212	+ 50
α Scorpii	596	1.3	16 23 23.790	+3.6712	− 22	−26 12 54.04	−8.232	− 28
[λ Ophiuchi][1]	227	3.7	16 25 58.188	+3.0230	− 27	+ 2 11 53.31	−8.061	− 65
β Herculis	228	2.3	16 26 0.336	+2.5757	− 90	+21 42 10.30	−8.007	− 12
A Draconis	229	5.0	16 28 10.159	−0.1395	− 90	+68 58 48.71	−7.785	+ 36
σ Herculis	230	4.1	16 30 56.589	+1.9317	− 20	+42 38 19.59	−7.570	+ 26
ζ Ophiuchi	597	2.6	16 31 45.653	+3.2988	− 7	−10 22 7.90	−7.496	+ 35
[Gr. 2373]	476	6.0	16 34 51.264	−2.6337	−215	+77 38 30.44	−7.002	+277
[ζ Herculis]	231	2.6	16 37 35.559	+2.2620	−357	+31 46 48.82	−6.644	+409
η Herculis	232	3.1	16 39 32.175	+2.0551	+ 28	+39 6 30.70	−6.973	− 77
Gr. 2377	477	5.0	16 43 26.374	+1.1364	+ 51	+56 57 24.37	−6.519	+ 56
49 Herculis	478	6.0	16 47 37.121	+2.7293	+ 3	+15 8 18.12	−6.229	− 1
κ Ophiuchi	233	3.3	16 53 1.698	+2.8367	−212	+ 9 31 38.20	−5.761	+ 15
ε Ursae min.	235	4.3	16 55 59.627	−6.2979	+ 90	+82 11 56.62	−5.530	− 3
ε Herculis	234	3.3	16 56 32.372	+2.2933	− 47	+31 4 13.63	−5.449	+ 32
[60 Herculis]	479	5.0	17 0 49.979	+2.7804	+ 30	+12 52 30.56	−5.122	− 2
[Gr. 2415]	480	6.0	17 4 34.785	+1.9502	− 84	+40 38 38.36	−4.815	− 14
η Ophiuchi	598	2.3	17 4 45.354	+3.4357	+ 3	−15 36 13.99	−4.690	+ 97
ζ Draconis	236	3.0	17 8 30.117	+0.1657	− 27	+65 50 7.21	−4.446	+ 22
α Herculis [2]	237	var.	17 10 10.685	+2.7333	− 19	+14 30 5.94	−4.294	+ 30
δ Herculis	238	3.0	17 11 0.336	+2.4621	− 28	+24 57 16.30	−4.406	−153
π Herculis	239	3.1	17 11 37.983	+2.0871	− 35	+36 55 9.46	−4.194	+ 5
ϑ Ophiuchi	599	3.4	17 15 59.357	+3.6796	− 24	−24 54 8.17	−3.862	− 35
[*x* Herculis]	481	5.8	17 24 8.259	+1.5857	− 28	+48 20 30.60	−3.161	− 34
β Draconis	240	2.6	17 28 13.089	+1.3532	− 20	+52 22 25.35	−2.767	+ 4
[ν¹ Draconis]	242	4.7	17 30 14.796	+1.1803	+183	+55 15 3.81	−2.548	+ 49
[ν² Draconis]	243	4.7	17 30 20.157	+1.1806	+179	+55 14 22.36	−2.545	+ 45
α Ophiuchi	241	2.0	17 30 23.064	+2.7822	+ 66	+12 37 52.10	−2.800	−217
ξ Serpentis	600	3.6	17 31 58.429	+3.4317	− 50	−15 20 13.49	−2.492	− 47
[*f* Draconis]	482	5.3	17 32 21.144	−0.2515	− 71	+68 11 50.46	−2.289	+125
ι Herculis	244	3.3	17 36 41.927	+1.6924	− 5	+46 3 29.54	−2.037	− 2
ω Draconis	483	5.0	17 37 31.489	−0.3545	+ 23	+68 48 11.26	−1.656	+308
β Ophiuchi	245	3.0	17 38 37.818	+2.9614	− 41	+ 4 36 28.93	−1.699	+167
μ Herculis	246	3.3	17 42 37.381	+2.3461	−244	+27 46 39.72	−2.263	−745
[γ Ophiuchi]	247	3.6	17 42 58.643	+3.0052	− 37	+ 2 44 38.14	−1.544	− 56

[1]) Dupl. 4^m u. 6^m, 1″.

[2]) Gröfse zwischen 3.2 u. 4.0.

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			h m s	s		° ′ ″	″	
ψ Drac. austr.	484	4.6	17 43 40.668	− 1.0802	− 1	+72 11 49.31	−1.695	−268
ξ Draconis	248	3.3	17 51 50.291	+ 1.0414	+ 169	+56 53 16.27	−0.637	+ 78
ϑ Herculis	249	4.0	17 52 53.431	+ 2.0539	− 23	+37 15 47.97	−0.603	+ 19
ν Ophiuchi	250	3.6	17 53 37.831	+ 3.3006	− 21	− 9 45 41.48	−0.653	− 97
35 Draconis	485	5.0	17 53 50.149	− 2.6900	+ 127	+76 58 33.35	−0.300	+240
[ξ Herculis]	251	3.6	17 53 57.386	+ 2.3302	+ 60	+29 15 28.70	−0.557	− 28
γ Draconis	252	2.3	17 54 19.788	+ 1.3909	− 18	+51 30 0.50	−0.524	− 28
67 Ophiuchi	253	4.0	17 55 44.283	+ 3.0059	+ 17	+ 2 56 9.89	−0.378	− 5
γ Sagittarii	601	3.3	17 59 30.738	+ 3.8524	− 54	−30 25 33.05	−0.253	−211
72 Ophiuchi	254	3.3	18 2 42.160	+ 2.8423	− 56	+ 9 32 58.82	+0.326	+ 89
ο Herculis	255	3.8	18 3 43.158	+ 2.3385	− 10	+28 44 55.28	+0.324	− 1
δ Ursae min.	256	4.3	18 3 53.857	−19.4876	+ 266	+86 36 48.34	+0.381	+ 40
μ Sagittarii	602	4.0	18 7 54.129	+ 3.5866	− 14	−21 5 5.61	+0.693	+ 1
[Gr. 2533]	486	5.4	18 12 35.643	+ 1.8578	− 78	+42 7 32.75	+1.106	+ 4
[36 Draconis]	487	5.0	18 13 19.866	+ 0.3436	+ 518	+64 21 49.83	+1.177	+ 15
η Serpentis	257	3.0	18 16 14.245	+ 3.1008	− 400	− 2 55 27.67	+0.744	−677
109 Herculis	258	4.0	18 19 31.288	+ 2.5551	+ 131	+21 43 29.18	+1.449	−257
[φ Draconis][1]	489	4.3	18 22 9.863	− 0.8551	− 1	+71 17 8.37	+1.956	+ 20
b Draconis	488	5.1	18 22 28.729	+ 0.8759	− 51	+58 44 37.18	+2.013	+ 49
χ Draconis	259	3.8	18 22 49.357	− 1.0825	+1137	+72 41 25.34	+1.619	−370
α Lyrae	260	1	18 33 37.224	+ 2.0309	+ 172	+38 41 32.39	+3.226	+296
[Gr. 2655]	490	6.0	18 34 29.432	− 2.8659	+ 87	+77 28 13.98	+2.991	− 15
[Gr. 2640]	491	6.0	18 35 54.662	+ 0.1857	− 30	+65 24 1.95	+3.156	+ 27
[ε Lyrae a. pr.]	261	4.5	18 41 5.457	+ 1.9837	− 22	+39 34 2.86	+3.656	+ 80
[5 Lyrae m.]	262	4.6	18 41 7.926	+ 1.9876	− 5	+39 30 35.95	+3.654	+ 74
110 Herculis	263	4.0	18 41 26.596	+ 2.5793	− 30	+20 27 7.55	+3.259	−348
β Lyrae[2]	264	var.	18 46 27.688	+ 2.2136	− 7	+33 14 55.79	+4.055	+ 17
σ Sagittarii	603	2.3	18 49 11.312	+ 3.7204	− 12	−26 25 7.84	+4.205	− 67
ο Draconis	265	4.6	18 49 45.309	+ 0.8860	+ 90	+59 16 6.42	+4.342	+ 23
ϑ Serpent. pr.	266	4.2	18 51 20.814	+ 2.9809	+ 10	+ 4 4 33.73	+4.504	+ 49
R Lyrae[3]	492	var.	18 52 21.168	+ 1.8248	+ 14	+43 48 59.99	+4.611	+ 70
[ε Aquilae]	267	4.0	18 55 10.462	+ 2.7215	− 49	+14 56 5.45	+4.701	− 80
γ Lyrae	268	3.3	18 55 16.610	+ 2.2423	− 18	+32 33 17.84	+4.801	+ 11
[υ Draconis]	493	5.1	18 55 36.011	− 0.7214	+ 103	+71 9 58.18	+4.848	+ 31
ζ Aquilae	270	3.0	19 0 54.292	+ 2.7552	− 26	+13 43 3.03	+5.177	− 89

[1] Dupl. 4.5^{m} u. 6.7^{m}, 0″.6.
[2] Gröſse zwischen 3.4 u. 4.5.
[3] Gröſse zwischen 4.3 u. 4.6.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0s.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0″.001
			h m s	s		° ′ ″	″	
λ Aquilae	269	3.1	19 1 2.837	+ 3.1824	— 38	— 5 1 47.17	+ 5.199	— 80
[ι Lyrae]	494	5.0	19 3 48.297	+ 2.1400	— 7	+35 56 46.97	+ 5.520	+ 9
π Sagittarii	604	3.1	19 3 56.150	+ 3.5685	— 22	—21 10 47.39	+ 5.488	— 34
δ Draconis	271	3.0	19 12 31.997	+ 0.0231	+155	+67 29 20.68	+ 6.320	+ 80
ϑ Lyrae	496	4.3	19 12 57.880	+ 2.0781	— 42	+37 57 31.83	+ 6.278	0
ω Aquilae	495	5.6	19 13 12.970	+ 2.8150	— 14	+11 25 6.46	+ 6.323	+ 25
ϰ Cygni	272	4.0	19 14 50.304	+ 1.3877	+ 65	+53 11 14.60	+ 6.544	+112
τ Draconis	273	4.8	19 17 26.461	— 1.1289	—316	+73 10 25.22	+ 6.755	+107
λ Ursae min.	284	6.4	19 20 14.108	—68.3095	—502	+88 59 29.36	+ 6.871	— 6
δ Aquilae	274	3.3	19 20 33.406	+ 3.0240	+153	+ 2 55 8.71	+ 6.995	+ 91
β Cygni	275	3.0	19 26 46.109	+ 2.4174	— 17	+27 45 12.32	+ 7.392	— 20
ι Cygni	276	4.1	19 27 14.149	+ 1.5135	+ 21	+51 31 14.62	+ 7.571	+121
[Gr. 2900]	497	6.3	19 27 37.608	— 3.5568	+ 20	+79 24 24.00	+ 7.449	— 32
h Sagittarii	605	4.6	19 30 44.579	+ 3.6521	+ 16	—25 6 0.52	+ 7.725	— 10
ϑ Cygni	498	4.6	19 33 48.804	+ 1.6084	— 34	+49 59 37.94	+ 8.220	+239
[15 Cygni]	499	5.3	19 40 44.565	+ 2.1637	+ 64	+37 7 2.61	+ 8.576	+ 42
γ Aquilae	277	3.0	19 41 36.003	+ 2.8512	— 5	+10 22 27.15	+ 8.609	+ 8
δ Cygni	278	2.8	19 41 54.746	+ 1.8752	+ 46	+44 53 28.46	+ 8.661	+ 35
δ Sagittae	279	4.0	19 43 1.024	+ 2.6733	— 15	+18 17 32.94	+ 8.750	+ 37
α Aquilae	280	1.3	19 46 0.090	+ 2.9268	+351	+ 8 36 33.10	+ 9.330	+384
[η Aquilae][1]	281	var.	19 47 28.794	+ 3.0553	— 17	+ 0 45 13.84	+ 9.060	— 3
ε Draconis	282	3.8	19 48 30.346	— 0.1870	+123	+70 1 5.66	+ 9.158	+ 16
β Aquilae	283	4.0	19 50 29.921	+ 2.9455	+ 7	+ 6 9 42.33	+ 8.825	—473
ψ Cygni	285	5.2	19 53 5.752	+ 1.5502	— 59	+52 10 42.31	+ 9.453	— 46
γ Sagittae	286	3.6	19 54 23.899	+ 2.6664	+ 30	+19 13 33.04	+ 9.636	+ 37
ϑ Aquilae	287	3.0	20 6 14.853	+ 3.0947	— 1	— 1 6 44.75	+10.510	+ 14
o^1 sq. Cygni[2]	288	4.5	20 10 32.741	+ 1.8884	— 4	+46 26 37.97	+10.817	+ 2
[33 Cygni]	500	4.3	20 11 7.297	+ 1.3994	+ 98	+56 16 2.87	+10.916	+ 60
ϰ Cephei	502	4.3	20 12 11.679	— 1.9483	— 15	+77 24 58.74	+10.949	+ 14
[α^1 Capric.]	606	4.3	20 12 12.953	+ 3.3267	— 8	—12 48 40.40	+10.963	+ 26
24 Vulpecul.	501	5.8	20 12 35.457	+ 2.5662	+ 4	+24 22 7.42	+10.933	— 32
α^2 Capric.	607	3.3	20 12 37.036	+ 3.3302	+ 22	—12 50 55.90	+10.983	+ 17
[β Capric.]	608	3.0	20 15 30.333	+ 3.3728	+ 8	—15 5 27.94	+11.200	+ 22
γ Cygni	289	2.4	20 18 42.682	+ 2.1521	— 1	+39 56 34.54	+11.428	+ 19
[ρ Capric.]	609	5.1	20 23 16.294	+ 3.4250	— 28	—18 8 16.36	+11.728	— 7

[1]) Gröfse zwischen 3.5 u. 4.7.

[2]) 30 (o^1 pr.) Cygni geht 19^s voran, 4′.5 nördlich; $7^m.8$ folgt 1^s, 1′.6 südlich.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0ˢ.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0″.001
ϑ Cephei	291	4.0	20ʰ 27ᵐ 56ˢ.255	+1ˢ.0116	+ 46	+62° 39′ 51″.99	+12″.037	− 27
ε Delphini	290	4.0	20 28 31.843	+2.8655	− 6	+10 58 11.63	+12.084	− 22
73 Draconis	504	5.3	20 32 48.350	−0.7442	+ 19	+74 37 7.63	+12.379	− 21
β Delphini	292	3.3	20 32 57.157	+2.8115	+ 55	+14 15 14.28	+12.382	− 29
[ϰ Delphini]	503	5.0	20 34 22.157	+2.9131	+ 197	+ 9 44 26.49	+12.519	+ 12
υ Capric.	610	5.6	20 34 28.299	+3.4185	− 34	−18 29 1.68	+12.529	+ 13
α Delphini	293	3.6	20 35 5.140	+2.7856	+ 31	+15 33 57.80	+12.555	− 2
α Cygni	294	1.6	20 38 5.458	+2.0438	− 3	+44 55 47.79	+12.764	+ 3
[δ Delphini]	295	4.0	20 38 53.004	+2.8000	− 25	+14 43 22.10	+12.772	− 43
[γ Delph. sq.]	296	4.0	20 42 6.693	+2.7823	− 34	+15 46 15.09	+12.835	− 196
ε Cygni	298	2.6	20 42 14.746	+2.4260	+ 280	+33 36 10.66	+13.374	+ 336
ε Aquarii	297	3.6	20 42 22.256	+3.2489	− 2	− 9 51 17.38	+13.020	− 27
[6 H. Cephei]	505	4.8	20 42 55.086	+1.4869	− 120	+57 13 39.92	+12.839	− 246
η Cephei	299	3.6	20 43 17.816	+1.2260	+ 123	+61 27 28.62	+13.919	+ 810
λ Cygni [1]	506	4.6	20 43 35.420	+2.3340	− 11	+36 7 49.72	+13.147	+ 18
76 Draconis	508	6.0	20 49 42.353	−4.0871	+ 142	+82 10 6.75	+13.537	+ 8
32 Vulpecul.	507	5.3	20 50 22.986	+2.5548	− 16	+27 41 4.57	+13.570	− 2
[Br. 2749]	509	5.9	20 52 3.009	−2.5847	− 75	+80 11 5.78	+13.638	− 40
ν Cygni	300	4.0	20 53 31.157	+2.2344	0	+40 47 23.13	+13.774	+ 1
[ξ Cygni]	301	4.0	21 1 21.986	+2.1806	+ 6	+43 32 11.59	+14.255	− 8
61 Cygni pr.	302	5.7	21 2 30.027	+2.6799	+3443	+38 16 1.46	+17.553	+3240
ν Aquarii	611	4.3	21 4 15.370	+3.2702	+ 43	−11 46 7.51	+14.434	− 7
Br. 2777	510	5.8	21 7 27.991	−1.1225	+ 68	+77 43 44.32	+14.656	+ 23
ζ Cygni	303	3.0	21 8 45.860	+2.5505	− 15	+29 49 28.66	+14.645	− 66
[Gr. 3415] [2]	511	5.8	21 9 18.553	+1.5281	− 13	+59 34 59.80	+14.725	− 18
[τ Cygni]	305	4.0	21 10 52.700	+2.3917	+ 120	+37 37 37.33	+15.296	+ 460
α Equulei	304	4.0	21 10 55.473	+2.9986	+ 21	+ 4 50 32.97	+14.761	− 78
α Cephei	306	2.6	21 16 14.468	+1.4345	+ 210	+62 10 12.03	+15.172	+ 26
ι Pegasi	512	4.3	21 17 33.197	+2.7730	+ 64	+19 23 6.20	+15.298	+ 75
ζ Capric.	612	4.1	21 21 4.397	+3.4313	− 13	−22 50 10.84	+15.435	+ 13
[g Cygni] [3]	513	5.0	21 25 49.868	+2.2093	+ 23	+46 6 29.02	+15.780	+ 96
β Aquarii	307	3.0	21 26 23.996	+3.1594	− 6	− 6 0 9.12	+15.715	− 1
β Cephei	308	3.0	21 27 23.887	+0.7890	+ 12	+70 7 49.16	+15.757	− 12
74 Cygni	514	5.0	21 33 1.216	+2.4014	− 10	+39 58 22.41	+16.077	+ 9
[γ Capric.]	613	3.6	21 34 39.738	+3.3283	+ 119	−17 6 18.53	+16.141	− 13

[1] Dupl. 5ᵐ u. 6.7ᵐ, 0″.6.
[2] Dupl. 6ᵐ.2 u. 7ᵐ.2, 1″.1.
[3] 6.7ᵐ folgt 10ˢ, 7′ südlich.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0s.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0″.001
			h m s	s		° ′ ″	″	
[13 H. Cephei]	515	6.0	21 35 55.159	+1.8610	+ 9	+57 2 44.20	+16.204	— 15
ε Pegasi	309	2.3	21 39 22.353	+2.9457	+ 8	+ 9 25 31.96	+16.406	+ 11
[κ Pegasi]	310	4.0	21 40 12.338	+2.7125	0	+25 11 39.67	+16.449	+ 13
[11 Cephei]	516	5.0	21 40 29.209	+0.8909	+208	+70 51 36.33	+16.530	+ 80
[λ Capric.]	614	5.3	21 41 15.675	+3.2328	+ 9	—11 49 6.34	+16.477	— 13
δ Capric.	615	3.0	21 41 37.956	+3.3151	+166	—16 34 20.27	+16.210	—297
π^2 Cygni	517	4.3	21 43 10.355	+2.2138	+ 11	+48 51 20.85	+16.562	— 21
16 Pegasi	518	5.3	21 48 36.148	+2.7270	— 5	+25 27 49.76	+16.844	— 2
[20 Pegasi]	519	5.8	21 56 18.895	+2.9218	+ 32	+12 39 0.76	+17.153	— 50
α Aquarii	311	3.0	22 0 45.001	+3.0811	— 8	— 0 47 45.85	+17.401	+ 2
ι Aquarii	616	4.0	22 1 8.662	+3.2421	0	—14 20 43.11	+17.367	— 49
20 Cephei	520	5.8	22 2 1.706	+1.8209	+ 21	+62 18 26.67	+17.499	+ 45
[ι Pegasi]	312	4.0	22 2 26.878	+2.7896	+209	+24 51 58.20	+17.489	+ 18
[27 Pegasi]	313	5.7	22 4 53.052	+2.6547	— 50	+32 41 36.59	+17.515	— 61
ϑ Pegasi	314	3.3	22 5 15.375	+3.0260	+175	+ 5 42 56.11	+17.632	+ 40
π Pegasi	315	4.2	22 5 38.043	+2.6601	— 20	+32 41 50.40	+17.602	— 5
ζ Cephei	316	3.4	22 7 27.103	+2.0733	— 16	+57 43 4.75	+17.677	— 6
24 Cephei	521	4.8	22 7 55.382	+1.1582	+ 21	+71 51 30.19	+17.695	— 7
ϑ Aquarii	522	4.3	22 11 39.763	+3.1669	+ 57	— 8 16 17.15	+17.834	— 19
γ Aquarii	317	3.4	22 16 35.652	+3.0986	+ 68	— 1 52 52.70	+18.063	+ 17
[31 Pegasi]	523	4.8	22 16 41.599	+2.9507	— 13	+11 42 40.41	+18.059	+ 10
3 Lacertae	524	4.4	22 19 42.250	+2.3509	— 36	+51 44 16.07	+17.960	—203
[δ Cephei] [1]	318	var.	22 25 31.836	+2.2189	+ 4	+57 54 48.34	+18.363	— 9
7 Lacertae	319	4.0	22 27 15.126	+2.4635	+131	+49 46 42.20	+18.436	+ 4
η Aquarii	320	3.8	22 30 19.209	+3.0824	+ 42	— 0 37 22.06	+18.484	— 53
[31 Cephei]	525	5.1	22 33 21.027	+1.4866	+419	+73 8 4.00	+18.659	+ 24
10 Lacertae	526	5.0	22 34 51.768	+2.6873	+ 11	+38 32 24.33	+18.685	0
[30 Cephei]	527	5.3	22 35 10.290	+2.1180	— 26	+63 4 29.07	+18.655	— 39
ζ Pegasi	321	3.3	22 36 34.437	+2.9905	+ 44	+10 19 10.29	+18.721	— 18
η Pegasi	322	3.0	22 38 24.435	+2.8070	+ 1	+29 42 30.65	+18.762	— 33
[13 Lacertae]	528	6.0	22 39 43.117	+2.6668	— 29	+41 18 17.03	+18.847	+ 12
λ Pegasi	323	4.0	22 41 48.582	+2.8856	+ 31	+23 2 59.45	+18.893	— 4
[τ Aquarii]	617	4.0	22 44 24.201	+3.1785	— 30	—14 6 36.75	+18.931	— 40
[μ Pegasi]	324	4.0	22 45 16.324	+2.8910	+ 96	+24 5 2.24	+18.954	— 42
ι Cephei	325	3.4	22 46 11.309	+2.1221	—142	+65 41 5.09	+18.882	—140

[1]) Gröfse zwischen 3.8 u. 5.0.

Name	Nr. des Fund.-Kat.	Gr.	AR. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0ˢ.0001	Decl. 1902.0	Jährl. Veränderung	Jährl. Eigenbew. in Einh. von 0″.001
			h m s	s		° ′ ″	″	
λ Aquarii	326	4.0	22 47 30.086	+3.1303	— 16	— 8 6 4.59	+19.098	+ 40
δ Aquarii	618	3.0	22 49 26.963	+3.1864	— 51	—16 20 31.51	+19.100	— 10
α Piscis austr.	619	1.3	22 52 14.156	+3.3221	+ 232	—30 8 30.94	+19.023	—159
o Androm.	327	3.6	22 57 24.603	+2.7511	+ 7	+41 47 57.08	+19.309	0
β Pegasi [1])	328	var.	22 59 1.313	+2.9024	+ 130	+27 33 3.61	+19.480	+133
α Pegasi	329	2.0	22 59 52.683	+2.9847	+ 28	+14 40 40.62	+19.336	— 30
c^2 Aquarii	620	4.0	23 4 13.339	+3.2023	+ 14	—21 42 15.89	+19.515	+ 54
π Cephei	529	4.6	23 4 46.752	+1.8978	+ 39	+74 51 27.39	+19.432	— 41
Br. 3077	530	6.0	23 8 33.609	+2.8692	+2499	+56 37 37.41	+19.831	+286
[γ Piscium]	330	4.0	23 12 5.039	+3.1082	+ 487	+ 2 44 48.12	+19.633	+ 17
τ Pegasi	531	4.6	23 15 47.095	+2.9638	+ 9	+23 12 13.33	+19.667	— 14
4 Cassiopej.	533	5.8	23 20 28.877	+2.6470	+ 10	+61 44 40.46	+19.734	— 21
[υ Pegasi]	532	4.6	23 20 29.138	+2.9873	+ 112	+22 51 52.14	+19.794	+ 39
κ Piscium	534	5.3	23 21 54.471	+3.0741	+ 41	+ 0 43 8.23	+19.675	—102
70 Pegasi	535	5.0	23 24 11.803	+3.0290	+ 13	+12 13 10.88	+19.838	+ 30
[72 Pegasi]	536	5.6	23 29 5.324	+2.9675	+ 19	+30 47 3.64	+19.865	— 5
[λ Androm.]	331	4.0	23 32 45.962	+2.9247	+ 158	+45 55 37.35	+19.486	—425
ι Androm.	332	4.0	23 33 19.665	+2.9308	+ 14	+42 43 31.18	+19.905	— 12
ι Piscium	333	4.3	23 34 54.523	+3.0831	+ 234	+ 5 5 41.85	+19.490	—443
γ Cephei	334	3.3	23 35 19.231	+2.4261	— 202	+77 5 6.65	+20.071	+135
[κ Androm.]	335	4.1	23 35 34.748	+2.9433	+ 69	+43 47 28.39	+19.914	— 24
ω^2 Aquarii	621	4.6	23 37 38.428	+3.1131	+ 53	—15 5 12.64	+19.902	— 55
41 H. Cephei	537	5.6	23 43 13.046	+2.8354	— 40	+67 15 44.09	+19.988	— 10
Lac. δ Sculpt.	622	4.4	23 43 49.225	+3.1278	+ 36	—28 40 20.28	+19.905	— 97
φ Pegasi	538	5.6	23 47 30.014	+3.0450	— 33	+18 34 33.08	+19.981	— 42
[ρ Cassiopej.]	539	4.8	23 49 28.984	+2.9753	— 32	+56 57 14.13	+20.018	— 12
ω Piscium	336	4.0	23 54 16.666	+3.0778	+ 87	+ 6 19 14.78	+19.938	—108

[1]) Gröfse zwischen 2.2 u. 2.7.

Von den Sternen, deren Namen eingeklammert sind, folgen keine Ephemeriden.

Obere Culmination.

1902	43 Hev. Cephei. $4^m.3$. AR.		Decl.		α Ursae minoris. $2^m.0$. AR.		Decl.		Gr. 750. $6^m.4$. AR.		Decl.	
	$0^h\ 55^m$		+85° 44′		$1^h\ 23^m$		+88° 47′		$4^h\ 5^m$		+85° 17′	
Jan. 1	25.82	28	16.75	3	64.94	95	25.90	8	60.15	14	55.64	24
2	25.54	26	16.78	3	63.99	90	25.98	6	60.01	13	55.88	22
3	25.28	25	16.81	4	63.09	86	26.04	7	59.88	12	56.10	23
4	25.03	24	16.85	4	62.23	85	26.11	9	59.76	11	56.33	24
5	24.79	25	16.89	5	61.38	86	26.20	9	59.65	12	56.57	24
6	24.54	26	16.94	5	60.52	91	26.29	10	59.53	11	56.81	26
7	24.28	28	16.99	6	59.61	96	26.39	11	59.42	13	57.07	27
8	24.00	29	17.05	5	58.65	102	26.50	10	59.29	14	57.34	28
9	23.71	30	17.10	4	57.63	107	26.60	9	59.15	15	57.62	28
10	23.41	32	17.14	2	56.56	111	26.69	7	59.00	18	57.90	27
11	23.09	32	17.16	1	55.45	113	26.76	5	58.82	18	58.17	27
12	22.77	31	17.17	— 2	54.32	113	26.81	3	58.64	20	58.44	24
13	22.46	30	17.15	4	53.19	109	26.84	2	58.44	20	58.68	23
14	22.16	28	17.11	5	52.10	103	26.86	0	58.24	19	58.91	20
15	21.88	27	17.06	5	51.07	98	26.86	1	58.05	19	59.11	19
16	21.61	25	17.01	6	50.09	92	26.85	1	57.86	17	59.30	17
17	21.36	25	16.95	4	49.17	89	26.84	1	57.69	16	59.47	17
18	21.11	24	16.91	4	48.28	88	26.83	0	57.53	16	59.64	18
19	20.87	25	16.87	3	47.40	90	26.83	2	57.37	16	59.82	20
20	20.62	26	16.84	2	46.50	93	26.85	3	57.21	16	60.02	20
21	20.36	27	16.82	2	45.57	98	26.88	2	57.05	17	60.22	22
22	20.09	29	16.80	3	44.59	104	26.90	2	56.88	19	60.44	21
23	19.80	30	16.77	5	43.55	109	26.92	0	56.69	21	60.65	22
24	19.50	30	16.72	7	42.46	112	26.92	2	56.48	22	60.87	21
25	19.20	31	16.65	10	41.34	113	26.90	4	56.26	24	61.08	19
26	18.89	30	16.55	11	40.21	111	26.86	7	56.02	25	61.27	17
27	18.59	28	16.44	14	39.10	106	26.79	10	55.77	24	61.44	14
28	18.31	27	16.30	15	38.04	101	26.69	10	55.53	24	61.58	12
29	18.04	25	16.15	15	37.03	95	26.59	11	55.29	24	61.70	10
30	17.79	23	16.00	14	36.08	89	26.48	11	55.05	23	61.80	10
31	17.56	23	15.86	14	35.19	86	26.37	10	54.82	21	61.90	9
Febr. 1	17.33	22	15.72	13	34.33	86	26.27	9	54.61	21	61.99	11
2	17.11	23	15.59	12	33.47	87	26.18	8	54.40	20	62.10	11
3	16.88	25	15.47	11	32.60	90	26.10	7	54.20	21	62.21	12
4	16.63	25	15.36	12	31.70	96	26.03	8	53.99	22	62.33	14
5	16.38	27	15.24	13	30.74	100	25.95	8	53.77	24	62.47	13
6	16.11	28	15.11	14	29.74	104	25.87	9	53.53	25	62.60	14
7	15.83		14.97		28.70		25.78		53.28		62.74	
O. C.	+ $0^s.29$ cos φ				+ $1^s.01$ cos φ				+ $0^s.26$ cos φ			
U. C.	— 0 .29 cos φ				— 1 .01 cos φ				— 0 .26 cos φ			

Obere Culmination.

1902	43 Hev. Cephei. $4^m.3$.				α Ursae minoris. $2^m.0$.				Gr. 750. $6^m.4$.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	$0^h\ 55^m$		$+85°\ 44'$		$1^h\ 23^m$		$+88°\ 47'$		$4^h\ 5^m$		$+85°\ 18'$	
Febr. 7	$15^s.83$	27	$14''.97$	16	$28^s.70$	105	$25''.78$	12	$53^s.28$	26	$2''.74$	12
8	15.56	28	14.81	19	27.65	104	25.66	14	53.02	27	2.86	11
9	15.28	26	14.62	19	26.61	101	25.52	16	52.75	27	2.97	8
10	15.02	24	14.43	21	25.60	96	25.36	17	52.48	27	3.05	6
11	14.78	23	14.22	22	24.64	89	25.19	18	52.21	26	3.11	4
12	14.55	21	14.00	22	23.75	82	25.01	19	51.95	25	3.15	2
13	14.34	19	13.78	21	22.93	76	24.82	18	51.70	24	3.17	2
14	14.15	19	13.57	21	22.17	73	24.64	16	51.46	23	3.19	2
15	13.96	18	13.36	19	21.44	73	24.48	16	51.23	22	3.21	2
16	13.78	19	13.17	18	20.71	75	24.32	15	51.01	22	3.23	4
17	13.59	20	12.99	18	19.96	78	24.17	14	50.79	22	3.27	5
18	13.39	22	12.81	18	19.18	83	24.03	15	50.57	24	3.32	6
19	13.17	22	12.63	19	18.35	88	23.88	16	50.33	25	3.38	6
20	12.95	23	12.44	21	17.47	91	23.72	18	50.08	27	3.44	5
21	12.72	23	12.23	23	16.56	91	23.54	19	49.81	27	3.49	3
22	12.49	22	12.00	25	15.65	89	23.35	22	49.54	29	3.52	1
23	12.27	21	11.75	28	14.76	84	23.13	24	49.25	29	3.53	— 2
24	12.06	18	11.47	29	13.92	78	22.89	26	48.96	28	3.51	3
25	11.88	17	11.18	29	13.14	72	22.63	26	48.68	27	3.48	6
26	11.71	15	10.89	29	12.42	65	22.37	27	48.41	26	3.42	7
27	11.56	14	10.60	28	11.77	59	22.10	25	48.15	25	3.35	8
28	11.42	14	10.32	27	11.18	57	21.85	25	47.90	24	3.27	7
März 1	11.28	13	10.05	25	10.61	57	21.60	23	47.66	23	3.20	6
2	11.15	14	9.80	25	10.04	58	21.37	23	47.43	23	3.14	4
3	11.01	14	9.55	24	9.46	62	21.14	22	47.20	23	3.10	4
4	10.87	16	9.31	25	8.84	67	20.92	22	46.97	24	3.06	3
5	10.71	17	9.06	26	8.17	69	20.70	23	46.73	25	3.03	3
6	10.54	16	8.80	27	7.48	71	20.47	24	46.48	27	3.00	5
7	10.38	17	8.53	29	6.77	71	20.23	26	46.21	28	2.95	6
8	10.21	15	8.24	31	6.06	68	19.97	28	45.93	28	2.89	8
9	10.06	14	7.93	32	5.38	62	19.69	30	45.65	27	2.81	10
10	9.92	11	7.61	33	4.76	54	19.39	31	45.38	26	2.71	12
11	9.81	10	7.28	32	4.22	46	19.08	31	45.12	26	2.59	14
12	9.71	8	6.96	32	3.76	39	18.77	31	44.86	23	2.45	15
13	9.63	6	6.64	31	3.37	35	18.46	29	44.63	22	2.30	15
14	9.57	7	6.33	29	3.02	32	18.17	28	44.41	20	2.15	14
15	9.50	6	6.04	27	2.70	33	17.89	26	44.21	20	2.01	13
16	9.44		5.77		2.37		17.63		44.01		1.88	
O. C.	$+0^s.29 \cos\varphi$				$+1^s.01 \cos\varphi$				$+0^s.26 \cos\varphi$			
U. C.	$-0.29 \cos\varphi$				$-1.01 \cos\varphi$				$-0.26 \cos\varphi$			

Obere Culmination.

1902	43 Hev. Cephei. $4^m.3$.				α Ursae minoris. $2^m.0$.				Gr. 750. $6^m.4$.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	$0^h\ 55^m$		$+85°\ 43'$		$1^h\ 22^m$		$+88°\ 47'$		$4^h\ 5^m$		$+85°\ 17'$	
März 16	$9^s.44$	6	$65''.77$	27	$62^s.37$	36	$17''.63$	26	$44^s.01$	20	$61''.88$	12
17	9.38	8	65.50	27	62.01	39	17.37	25	43.81	21	61.76	11
18	9.30	9	65.23	27	61.62	43	17.12	26	43.60	22	61.65	11
19	9.21	10	64.96	28	61.19	46	16.86	27	43.38	23	61.54	11
20	9.11	9	64.68	30	60.73	46	16.59	29	43.15	24	61.43	12
21	9.02	8	64.38	32	60.27	45	16.30	31	42.91	25	61.31	13
22	8.94	8	64.06	34	59.82	42	15.99	32	42.66	25	61.18	17
23	8.86	6	63.72	35	59.40	35	15.67	34	42.41	24	61.01	19
24	8.80	4	63.37	36	59.05	28	15.33	35	42.17	24	60.82	21
25	8.76	2	63.01	35	58.77	20	14.98	35	41.93	22	60.61	22
26	8.74	0	62.66	35	58.57	14	14.63	34	41.71	20	60.39	23
27	8.74	1	62.31	33	58.43	10	14.29	33	41.51	19	60.16	22
28	8.75	1	61.98	31	58.33	8	13.96	31	41.32	17	59.94	21
29	8.76	2	61.67	29	58.25	9	13.65	29	41.15	18	59.73	20
30	8.78	1	61.38	29	58.16	12	13.36	29	40.97	16	59.53	19
31	8.79	— 1	61.09	28	58.04	15	13.07	29	40.81	18	59.34	18
April 1	8.78	2	60.81	29	57.89	19	12.78	29	40.63	19	59.16	18
2	8.76	3	60.52	30	57.70	21	12.49	30	40.44	19	58.98	18
3	8.73	2	60.22	32	57.49	21	12.19	30	40.25	20	58.80	19
4	8.71	1	59.90	33	57.28	18	11.89	33	40.05	21	58.61	21
5	{ 8.70	0	{ 59.57	35	57.10	13	11.56	35	39.84	20	58.40	23
	{ 8.70	3	{ 59.22	34								
6	8.73	5	58.88	35	56.97	6	11.21	35	39.64	20	58.17	25
7	8.78	6	58.53	34	56.91	— 2	10.86	35	39.44	17	57.92	27
8	8.84	8	58.19	32	56.93	10	10.51	35	39.27	16	57.65	27
9	8.92	9	57.87	30	57.03	15	10.16	34	39.11	14	57.38	29
10	9.01	9	57.57	28	57.18	19	9.82	31	38.97	12	57.09	27
11	9.10	9	57.29	27	57.37	20	9.51	30	38.85	12	56.82	26
12	9.19	8	57.02	26	{ 57.57	19	{ 9.21	28	38.73	12	56.56	25
					{ 57.76	16	{ 8.93	27				
13	9.27	7	56.76	26	57.92	11	8.66	28	38.61	11	56.31	23
14	9.34	6	56.50	27	58.03	7	8.38	28	38.50	12	56.08	23
15	9.40	5	56.23	29	58.10	6	8.10	29	38.38	13	55.85	23
16	9.45	6	55.94	30	58.16	6	7.81	30	38.25	14	55.62	22
17	9.51	7	55.64	32	58.22	9	7.51	33	38.11	15	55.40	24
18	9.58	8	55.32	32	58.31	15	7.18	34	37.96	15	55.16	26
19	9.66	10	55.00	33	58.46	22	6.84	35	37.81	14	54.90	28
20	9.76		54.67		58.68		6.49		37.67		54.62	
O. C.	$+0^s.29 \cos\varphi$				$+1^s.01 \cos\varphi$				$+0^s.26 \cos\varphi$			
U. C.	$-0^s.29 \cos\varphi$				$-1^s.01 \cos\varphi$				$-0^s.26 \cos\varphi$			

Obere Culmination.

1902	43 Hev. Cephei. $4^m.3$.				α Ursae minoris. $2^m.0$.				Gr. 750. $6^m.4$.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	0^h 55^m		+85° 43′		1^h 22^m		+88° 46′		4^h 5^m		+85° 17′	
April 20	9.76	13	54.67	33	58.68	30	66.49	34	37.67	13	54.62	30
21	9.89	15	54.34	31	58.98	36	66.15	33	37.54	12	54.32	32
22	10.04	15	54.03	29	59.34	41	65.82	32	37.42	10	54.00	32
23	10.19	15	53.74	28	59.75	44	65.50	30	37.32	8	53.68	32
24	10.34	16	53.46	27	60.19	44	65.20	28	37.24	7	53.36	31
25	10.50	15	53.19	25	60.63	42	64.92	28	37.17	7	53.05	30
26	10.65	14	52.94	24	61.05	38	64.64	26	37.10	5	52.75	28
27	10.79	14	52.70	24	61.43	34	64.38	26	37.05	6	52.47	27
28	10.93	12	52.46	24	61.77	31	64.12	26	36.99	7	52.20	25
29	11.05	12	52.22	25	62.08	30	63.86	27	36.92	8	51.95	26
30	11.17	13	51.97	27	62.38	31	63.59	29	36.84	7	51.69	26
Mai 1	11.30	14	51.70	28	62.69	36	63.30	30	36.77	9	51.43	28
2	11.44	15	51.42	28	63.05	41	63.00	31	36.68	8	51.15	30
3	11.59	17	51.14	28	63.46	49	62.69	30	36.60	8	50.85	31
4	11.76	20	50.86	27	63.95	57	62.39	30	36.52	6	50.54	33
5	11.96	21	50.59	26	64.52	63	62.09	29	36.46	4	50.21	33
6	12.17	22	50.33	23	65.15	66	61.80	27	36.42	2	49.88	34
7	12.39	23	50.10	21	65.81	68	61.53	25	36.40	1	49.54	33
8	12.62	22	49.89	20	66.49	68	61.28	23	36.39	1	49.21	31
9	12.84	21	49.69	18	67.17	65	61.05	21	36.40	2	48.90	30
10	13.05	21	49.51	18	67.82	61	60.84	21	36.42	1	48.60	29
11	13.26	19	49.33	17	68.43	56	60.63	20	36.43	1	48.31	28
12	13.45	18	49.16	19	68.99	52	60.43	21	36.44	1	48.03	26
13	13.63	17	48.97	20	69.51	51	60.22	23	36.45	0	47.77	27
14	13.80	19	48.77	22	70.02	54	59.99	24	36.45	1	47.50	27
15	13.99	20	48.55	22	70.56	58	59.75	25	36.44	2	47.23	29
16	14.19	22	48.33	23	71.14	64	59.50	27	36.42	1	46.94	30
17	14.41	23	48.10	24	71.78	71	59.23	26	36.41	1	46.64	33
18	14.64	25	47.86	22	72.49	78	58.97	25	36.40	1	46.31	34
19	14.89	27	47.64	19	73.27	83	58.72	24	36.41	2	45.97	34
20	15.16	28	47.45	17	74.10	85	58.48	23	36.43	4	45.63	34
21	15.44	27	47.28	16	74.95	86	58.25	20	36.47	6	45.29	33
22	15.71	26	47.12	14	75.81	85	58.05	18	36.53	7	44.96	31
23	15.97	25	46.98	12	76.66	81	57.87	16	36.60	7	44.65	30
24	16.22	24	46.86	12	77.47	76	57.71	16	36.67	7	44.35	29
25	16.46	23	46.74	13	78.23	72	57.55	16	{ 36.74 / 36.81	7 / 7	{ 44.06 / 43.79	27 / 26
26	16.69		46.61		78.95		57.39		36.88		43.53	
O. C.	+ 0ˢ.29 cos φ				+ 1ˢ.01 cos φ				+ 0ˢ.26 cos φ			
U. C.	— 0 .29 cos φ				— 1 .01 cos φ				— 0 .26 cos φ			

Obere Culmination.

1902	43 Hev. Cephei. 4ᵐ.3. AR.	Diff.	Decl.	Diff.	α Ursae minoris. 2ᵐ.0. AR.	Diff.	Decl.	Diff.	Gr. 750. 6ᵐ.4. AR.	Diff.	Decl.	Diff.
	0ʰ 55ᵐ		+85° 43′		1ʰ 23ᵐ		+88° 46′		4ʰ 5ᵐ		+85° 17′	
Mai 26	16ˢ.69	22	46″.61	13	18ˢ.95	69	57″.39	17	36ˢ.88	6	43″.53	25
27	16.91	22	46.48	14	19.64	70	57.22	17	36.94	5	43.28	27
28	17.13	23	46.34	15	20.34	72	57.05	19	36.99	5	43.01	28
29	17.36	24	46.19	15	21.06	76	56.86	19	37.04	5	42.73	29
30	17.60	27	46.04	16	21.82	82	56.67	20	37.09	7	42.44	31
31	17.87	28	45.88	14	22.64	90	56.47	19	37.16	8	42.13	32
Juni 1	18.15	30	45.74	13	23.54	96	56.28	18	37.24	10	41.81	32
2	18.45	30	45.61	12	24.50	100	56.10	16	37.34	12	41.49	33
3	18.75	32	45.49	9	25.50	103	55.94	14	37.46	14	41.16	31
4	19.07	31	45.40	8	26.53	102	55.80	11	37.60	15	40.85	28
5	19.38	30	45.32	5	27.55	99	55.69	10	37.75	15	40.57	26
6	19.68	28	45.27	4	28.54	94	55.59	9	37.90	14	40.31	25
7	19.96	27	45.23	4	29.48	89	55.50	8	38.04	14	40.06	23
8	20.23	26	45.19	4	30.37	85	55.42	9	38.18	13	39.83	23
9	20.49	25	45.15	5	31.22	82	55.33	9	38.31	11	39.60	23
10	20.74	25	45.10	6	32.04	83	55.24	10	38.42	12	39.37	25
11	20.99	26	45.04	8	32.87	85	55.14	11	38.54	11	39.12	25
12	21.25	28	44.96	9	33.72	90	55.03	13	38.65	12	38.87	27
13	21.53	29	44.87	8	34.62	95	54.90	13	38.77	13	38.60	29
14	21.82	31	44.79	8	35.57	102	54.77	13	38.90	14	38.31	29
15	22.13	32	44.71	6	36.59	107	54.64	11	39.04	16	38.02	29
16	22.45	33	44.65	4	37.66	110	54.53	9	39.20	17	37.73	29
17	22.78	33	44.61	2	38.76	110	54.44	7	39.37	19	37.44	27
18	23.11	32	44.59	0	39.86	109	54.37	5	39.56	20	37.17	25
19	23.43	32	44.59	2	40.95	106	54.32	3	39.76	20	36.92	23
20	23.75	29	44.61	3	42.01	101	54.29	2	39.96	19	36.69	21
21	24.04	28	44.64	3	43.02	95	54.27	2	40.15	18	36.48	19
22	24.32	27	44.67	2	43.97	91	54.25	2	40.33	17	36.29	20
23	24.59	27	44.69	1	44.88	89	54.23	3	40.50	17	36.09	19
24	24.86	26	44.70	0	45.77	90	54.20	4	40.67	16	35.90	20
25	25.12	28	44.70	0	46.67	93	54.16	5	40.83	17	35.70	22
26	25.40	29	44.70	1	47.60	98	54.11	5	41.00	18	35.48	23
27	25.69	30	44.69	0	48.58	104	54.06	5	41.18	18	35.25	24
28	25.99	32	44.69	1	49.62	110	54.01	4	41.36	20	35.01	25
29	26.31	34	44.70	4	50.72	115	53.97	2	41.56	22	34.76	24
30	26.65	34	44.74	5	51.87	117	53.95	0	41.78	24	34.52	22
Juli 1	26.99	34	44.79	7	53.04	117	53.95	2	42.02	25	34.30	21
2	27.33		44.86		54.21		53.97		42.27		34.09	
O. C.	+ 0ˢ.29 cos φ				+ 1ˢ.01 cos φ				+ 0ˢ.26 cos φ			
U. C.	— 0 .29 cos φ				— 1 .01 cos φ				— 0 .26 cos φ			

Obere Culmination.

1902	43 Hev. Cephei. 4ᵐ.3.				α Ursae minoris. 2ᵐ.0.				Gr. 750. 6ᵐ.4.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	0ʰ 55ᵐ		+85° 43′		1ʰ 23ᵐ		+88° 46′		4ʰ 5ᵐ		+85° 17′	
Juli 2	27ˢ.33	32	44″.86	9	54ˢ.21	114	53″.97	4	42ˢ.27	26	34″.09	19
3	27.65	31	44.95	12	55.35	110	54.01	6	42.53	24	33.90	17
4	27.96	29	45.07	11	56.45	104	54.07	6	42.77	25	33.73	15
5	28.25	28	45.18	11	57.49	98	54.13	7	43.02	24	33.58	14
6	28.53	27	45.29	10	58.47	93	54.20	7	43.26	22	33.44	14
7	28.80	27	45.39	9	59.40	92	54.27	5	43.48	22	33.30	15
8	29.07	26	45.48	8	60.32	94	54.32	3	43.70	20	33.15	16
9	29.33	28	45.56	7	61.26	97	54.35	3	43.90	21	32.99	17
10	29.61	30	45.63	6	62.23	101	54.38	1	44.11	22	32.82	18
11	29.91	30	45.69	7	63.24	106	54.39	2	44.33	23	32.64	19
12	30.21	32	45.76	9	64.30	111	54.41	4	44.56	25	32.45	19
13	30.53	32	45.85	10	65.41	115	54.45	5	44.81	26	32.26	19
14	30.85	34	45.95	13	66.56	117	54.50	7	45.07	27	32.07	17
15	31.19	32	46.08	14	67.73	115	54.57	10	45.34	28	31.90	15
16	31.51	30	46.22	16	68.88	111	54.67	11	45.62	29	31.75	14
17	31.81	30	46.38	17	69.99	106	54.78	12	45.91	28	31.61	11
18	32.11	27	46.55	18	71.05	99	54.90	13	46.19	27	31.50	10
19	32.38	25	46.73	17	72.04	94	55.03	13	46.46	26	31.40	8
20	32.63	25	46.90	16	72.98	91	55.16	13	46.72	24	31.32	9
21	32.88	25	47.06	15	73.89	90	55.29	11	46.96	24	31.23	8
22	33.13	25	47.21	15	74.79	91	55.40	10	47.20	24	31.15	11
23	33.38	27	47.36	14	75.70	95	55.50	9	47.44	25	31.04	11
24	33.65	28	47.50	13	76.65	100	55.59	10	47.69	25	30.93	12
25	33.93	29	47.63	15	77.65	106	55.69	10	47.94	27	30.81	14
26	34.22	31	47.78	17	78.71	110	55.79	12	48.21	29	30.67	12
27	34.53	31	47.95	19	79.81	113	55.91	14	48.50	30	30.55	12
28	34.84	31	48.14	20	80.94	113	56.05	16	48.80	31	30.43	10
29	35.15	30	48.34	23	82.07	111	56.21	17	49.11	32	30.33	8
30	35.45	29	48.57	24	83.18	106	56.38	20	49.43	31	30.25	6
31	35.74	26	48.81	25	84.24	100	56.58	21	49.74	31	30.19	4
Aug. 1	36.00	25	49.06	26	85.24	94	56.79	21	50.05	30	30.15	2
2	36.25	23	49.32	24	86.18	88	57.00	20	50.35	29	30.13	2
3	36.48	23	49.56	24	87.06	85	57.20	19	50.64	27	30.11	2
4	36.71	22	49.80	22	87.91	84	57.39	19	50.91	26	30.09	3
5	36.93	23	50.02	20	88.75	85	57.58	17	51.17	26	30.06	4
6	37.16	24	50.22	20	89.60	89	57.75	16	51.43	27	30.02	5
7	37.40	25	50.42	20	90.49	94	57.91	16	51.70	28	29.97	6
8	37.65		50.62		91.43		58.07		51.98		29.91	
O. C.	+ 0ˢ.29 cos φ				+ 1ˢ.01 cos φ				+ 0ˢ.26 cos φ			
U. C.	— 0 .29 cos φ				— 1 .01 cos φ				— 0 .26 cos φ			

Obere Culmination.

1902	43 Hev. Cephei. $4^m.3$.				α Ursae minoris. $2^m.0$.				Gr. 750. $6^m.4$.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	$0^h\ 55^m$		$+85°\ 43'$		$1^h\ 24^m$		$+88°\ 46'$		$4^h\ 5^m$		$+85°\ 17'$	
Aug. 8	$37^s.65$	27	$50''.62$	20	$31^s.43$	99	$58''.07$	17	$51^s.98$	29	$29''.91$	7
9	37.92	28	50.82	23	32.42	103	58.24	18	52.27	30	29.84	7
10	38.20	28	51.05	24	33.45	104	58.42	19	52.57	32	29.77	5
11	38.48	27	51.29	26	34.49	103	58.61	21	52.89	32	29.72	4
12	38.75	25	51.55	28	35.52	99	58.82	24	53.21	33	29.68	1
13	39.00	24	51.83	29	36.51	94	59.06	26	53.54	32	29.67	— 1
14	39.24	23	52.12	30	37.45	87	59.32	26	53.86	31	29.68	3
15	39.47	21	52.42	29	38.32	81	59.58	26	54.17	30	29.71	4
16	39.68	19	52.71	29	39.13	76	59.84	25	54.47	29	29.75	4
17	39.87	19	53.00	28	39.89	74	60.09	25	54.76	28	29.79	4
18	40.06	18	53.28	26	40.63	74	60.34	23	55.04	27	29.83	3
19	40.24	20	53.54	25	41.37	76	60.57	22	55.31	27	29.86	2
20	40.44	21	53.79	25	42.13	80	60.79	22	55.58	28	29.88	1
21	40.65	22	54.04	26	42.93	85	61.01	22	55.86	29	29.89	0
22	40.87	23	54.30	28	43.78	90	61.23	24	56.15	31	29.89	0
23	41.10	24	54.58	29	44.68	93	61.47	25	56.46	32	29.89	1
24	41.34	24	54.87	30	45.61	94	61.72	27	56.78	33	29.90	2
25	41.58	23	55.17	32	46.55	92	61.99	29	57.11	34	29.92	4
26	41.81	21	55.49	35	47.47	87	62.28	31	57.45	33	29.96	6
27	42.02	20	55.84	35	48.34	80	62.59	32	57.78	33	30.02	9
28	42.22	18	56.19	35	49.14	75	62.91	32	58.11	32	30.11	9
29	42.40	16	56.54	35	49.89	68	63.23	33	58.43	31	30.20	11
30	42.56	15	56.89	34	50.57	63	63.56	31	58.74	29	30.31	12
31	42.71	15	57.23	32	51.20	61	63.87	29	59.03	27	30.43	11
Sept. 1	42.86	13	57.55	31	51.81	61	64.16	29	59.30	28	30.54	10
2	42.99	15	57.86	30	52.42	63	64.45	27	59.58	28	30.64	8
3	43.14	17	58.16	29	53.05	67	64.72	26	59.86	27	30.72	7
4	43.31	17	58.45	30	53.72	72	64.98	27	60.13	29	30.79	6
5	43.48	19	58.75	31	54.44	76	65.25	28	60.42	30	30.85	6
6	43.67	19	59.06	32	55.20	78	65.53	29	60.72	31	30.91	7
7	43.86	18	59.38	34	55.98	77	65.82	32	61.03	32	30.98	8
8	44.04	18	59.72	36	56.75	73	66.14	32	61.35	32	31.06	10
9	44.22	16	60.08	38	57.48	69	66.46	34	61.67	31	31.16	13
10	44.38	14	60.46	37	58.17	63	66.80	36	61.98	32	31.29	15
11	44.52	12	60.83	37	58.80	55	67.16	36	62.30	30	31.44	16
12	44.64	10	61.20	37	59.35	49	67.52	35	62.60	29	31.60	17
13	44.74	9	61.57	36	59.84	45	67.87	34	62.89	27	31.77	17
14	44.83		61.93		60.29		68.21		63.16		31.94	
O. C.	$+ 0^s.29 \cos\varphi$				$+ 1^s.01 \cos\varphi$				$+ 0^s.26 \cos\varphi$			
U. C.	$- 0.29 \cos\varphi$				$- 1.01 \cos\varphi$				$- 0.26 \cos\varphi$			

Obere Culmination.

1902	43 Hev. Cephei. $4^m.3$.				α Ursae minoris. $2^m.0$.				Gr. 750. $6^m.4$.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	$0^h\ 55^m$		$+85°\ 44'$		$1^h\ 25^m$		$+88°\ 47'$		$4^h\ 6^m$		$+85°\ 17'$	
Sept. 14	44.83	10	1.93	35	0.29	44	8.21	33	3.16	26	31.94	16
15	44.93	9	2.28	33	0.73	45	8.54	32	3.42	26	32.10	15
16	45.02	11	2.61	33	1.18	48	8.86	31	3.68	26	32.25	14
17	45.13	11	2.94	32	1.66	52	9.17	30	3.94	27	32.39	13
18	45.24	13	3.26	33	2.18	57	9.47	31	4.21	28	32.52	13
19	45.37	14	3.59	35	2.75	60	9.78	33	4.49	29	32.65	12
20	45.51	13	3.94	36	3.35	62	10.11	35	4.78	30	32.77	14
21	45.64	14	4.30	38	3.97	60	10.46	36	5.08	31	32.91	15
22	45.78	12	4.68	40	4.57	56	10.82	37	5.39	32	33.06	17
23	45.90	10	5.08	41	5.13	51	11.19	39	5.71	31	33.23	20
24	46.00	8	5.49	42	5.64	44	11.58	40	6.02	30	33.43	22
25	46.08	6	5.91	41	6.08	36	11.98	40	6.32	28	33.65	23
26	46.14	5	6.32	39	6.44	30	12.38	39	6.60	26	33.88	23
27	46.19	3	6.71	37	6.74	27	12.77	37	6.86	25	34.11	23
28	46.22	4	7.08	36	7.01	26	13.14	36	7.11	25	34.34	22
29	46.26	4	7.44	35	7.27	27	13.50	35	7.36	23	34.56	21
30	46.30	5	7.79	33	7.54	30	13.85	33	7.59	24	34.77	19
Oct. 1	46.35	6	8.12	34	7.84	34	14.18	32	7.83	24	34.96	17
2	46.41	7	8.46	34	8.18	37	14.50	33	8.07	26	35.13	17
3	46.48	8	8.80	36	8.55	40	14.83	34	8.33	26	35.30	19
4	46.56	7	9.16	36	8.95	41	15.17	36	8.59	28	35.49	19
5	46.63	7	9.52	39	9.36	38	15.53	39	8.87	27	35.68	21
6	46.70	5	9.91	41	9.74	33	15.92	39	9.14	28	35.89	23
7	46.75	4	10.32	41	10.07	27	16.31	40	9.42	27	36.12	25
8	46.79	1	10.73	40	10.34	19	16.71	41	9.69	25	36.37	27
9	46.80	— 1	11.13	40	10.53	13	17.12	40	9.94	23	36.64	27
10	46.79	2	11.53	38	10.66	7	17.52	39	10.17	23	36.91	28
11	46.77	2	11.91	37	10.73	5	17.91	37	10.40	21	37.19	27
12	46.75	2	12.28	36	10.78	5	18.28	36	10.61	20	37.46	26
13	46.73	2	12.64	34	10.83	7	18.64	34	10.81	20	37.72	25
14	46.71	0	12.98	34	10.90	10	18.98	35	11.01	21	37.97	24
15	46.71	0	13.32	34	11.00	14	19.33	34	11.22	21	38.21	23
16	46.71	1	13.66	35	11.14	18	19.67	35	11.43	22	38.44	22
17	46.72	2	14.01	36	11.32	21	20.02	36	11.65	24	38.66	24
18	46.74	2	14.37	38	11.53	20	20.38	37	11.89	25	38.90	25
19	46.76	1	14.75	40	11.73	17	20.75	40	12.14	24	39.15	26
20	46.77	— 1	15.15	41	11.90	11	21.15	41	12.38	24	39.41	29
21	46.76		15.56		12.01		21.56		12.62		39.70	
O. C.	$+ 0^s.29 \cos\varphi$				$+ 1^s.01 \cos\varphi$				$+ 0^s.26 \cos\varphi$			
U. C.	$- 0.29 \cos\varphi$				$- 1.01 \cos\varphi$				$- 0.26 \cos\varphi$			

Obere Culmination.

1902	43 Hev. Cephei. $4^m.3$.				α Ursae minoris. $2^m.0$.				Gr. 750. $6^m.4$.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	$0^h\ 55^m$		+85° 44′		$1^h\ 25^m$		+88° 47′		$4^h\ 6^m$		+85° 17′	
Oct. 21	$46^s.76$	4	15″.56	41	$12^s.01$	5	21″.56	43	$12^s.62$	23	39″.70	31
22	46.72	5	15.97	41	12.06	3	21.99	41	12.85	21	40.01	32
23	46.67	7	16.38	39	12.03	10	22.40	41	13.06	20	40.33	33
24	46.60	8	16.77	38	11.93	15	22.81	39	13.26	19	40.66	33
25	46.52	9	17.15	36	11.78	17	23.20	37	13.45	17	40.99	31
26	46.43	9	17.51	34	11.61	16	23.57	37	13.62	16	41.30	30
27	46.34	7	17.85	32	11.45	14	23.94	34	13.78	15	41.60	29
28	46.27	6	18.17	33	11.31	11	24.28	33	13.93	16	41.89	26
29	46.21	6	18.50	32	11.20	8	24.61	33	14.09	17	42.15	26
30	46.15	4	18.82	33	11.12	4	24.94	34	14.26	17	42.41	26
31	46.11	4	19.15	33	11.08	2	25.28	34	14.43	19	42.67	28
Nov. 1	46.07	5	19.48	36	11.06	5	25.62	37	14.62	19	42.95	28
2	46.02	6	19.84	37	11.01	9	25.99	38	14.81	19	43.23	31
3	45.96	8	20.21	38	10.92	15	26.37	39	15.00	18	43.54	32
4	45.88	11	20.59	37	10.77	22	26.76	39	15.18	17	43.86	34
5	45.77	12	20.96	36	10.55	29	27.15	39	15.35	15	44.20	35
6	45.65	14	21.32	36	10.26	34	27.54	37	15.50	14	44.55	35
7	45.51	14	21.68	34	9.92	39	27.91	37	15.64	11	44.90	35
8	45.37	15	22.02	32	9.53	41	28.28	34	15.75	11	45.25	34
9	45.22	14	22.34	30	9.12	40	28.62	33	15.86	11	45.59	32
10	45.08	13	22.64	29	8.72	36	28.95	32	15.97	10	45.91	30
11	44.95	13	22.93	30	8.36	32	29.27	31	16.07	11	46.21	29
12	44.82	11	23.23	29	8.04	27	29.58	31	16.18	12	46.50	30
13	44.71	9	23.52	30	7.77	25	29.89	33	16.30	13	46.80	29
14	44.62	10	23.82	32	7.52	24	30.22	33	16.43	13	47.09	30
15	44.52	11	24.14	33	7.28	27	30.55	36	16.56	15	47.39	32
16	44.41	13	24.47	34	7.01	32	30.91	36	16.71	13	47.71	34
17	44.28	14	24.81	34	6.69	38	31.27	37	16.84	13	48.05	35
18	44.14	17	25.15	34	6.31	44	31.64	37	16.97	12	48.40	37
19	43.97	18	25.49	34	5.87	52	32.01	36	17.09	10	48.77	37
20	43.79	20	25.83	31	5.35	58	32.37	34	17.19	8	49.14	38
21	43.59	20	26.14	29	4.77	61	32.71	33	17.27	6	49.52	36
22	43.39	20	26.43	27	4.16	61	33.04	31	17.33	4	49.88	35
23	43.19	20	26.70	25	3.55	60	33.35	29	17.37	4	50.23	34
24	42.99	18	26.95	24	2.95	57	33.64	27	17.41	4	50.57	32
25	42.81	17	27.19	24	2.38	53	33.91	27	17.45	4	50.89	30
26	42.64	17	27.43	24	1.85	49	34.18	27	17.49	6	51.19	30
27	42.47		27.67		1.36		34.45		17.55		51.49	
O. C.	$+0^s.29\cos\varphi$				$+1^s.01\cos\varphi$				$+0^s.26\cos\varphi$			
U. C.	$-0.29\cos\varphi$				$-1.01\cos\varphi$				$-0.26\cos\varphi$			

Obere Culmination.

1902	43 Hev. Cephei. $4^m.3$.				α Ursae minoris. $2^m.0$.				Gr. 750. $6^m.4$.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	$0^h\ 55^m$		$+85°\ 44'$		$1^h\ 24^m$		$+88°\ 47'$		$4^h\ 6^m$		$+85°\ 17'$	
	s		"		s		"		s		"	
Nov. 27	42.47	16	27.67	25	61.36	47	34.45	28	17.55	6	51.49	30
28	42.31	15	27.92	26	60.89	47	34.73	28	17.61	7	51.79	31
29	42.16	17	28.18	27	60.42	50	35.01	30	17.68	7	52.10	32
30	41.99	18	28.45	28	59.92	55	35.31	31	17.75	6	52.42	34
Dec. 1	41.81	20	28.73	26	59.37	63	35.62	31	17.81	5	52.76	36
2	41.61	22	28.99	27	58.74	69	35.93	31	17.86	4	53.12	38
3	41.39	24	29.26	26	58.05	75	36.24	30	17.90	1	53.50	37
4	41.15	26	29.52	24	57.30	80	36.54	28	17.91	0	53.87	37
5	40.89	26	29.76	22	56.50	83	36.82	27	17.91	1	54.24	36
6	40.63	25	29.98	20	55.67	81	37.09	24	17.90	2	54.60	33
7	40.38	23	30.18	18	54.86	79	37.33	22	17.88	3	54.93	32
8	40.15	23	30.36	17	54.07	75	37.55	21	17.85	3	55.25	31
9	39.92	22	30.53	17	53.32	70	37.76	22	17.82	2	55.56	29
10	39.70	20	30.70	18	52.62	67	37.98	21	17.80	1	55.85	30
11	39.50	20	30.88	19	51.95	65	38.19	22	17.79	0	56.15	29
12	39.30	21	31.07	20	51.30	65	38.41	24	17.79	1	56.44	31
13	39.09	21	31.27	21	50.65	68	38.65	25	17.80	0	56.75	33
14	38.88	23	31.48	22	49.97	73	38.90	26	17.80	0	57.08	34
15	38.65	25	31.70	21	49.24	80	39.16	25	17.80	1	57.42	36
16	38.40	27	31.91	21	48.44	88	39.41	25	17.79	3	57.78	36
17	38.13	28	32.12	19	47.56	93	39.66	24	17.76	5	58.14	36
18	37.85	29	32.31	17	46.63	97	39.90	22	17.71	7	58.50	34
19	37.56	29	32.48	14	45.66	98	40.12	19	17.64	8	58.84	34
20	37.27	28	32.62	12	44.68	97	40.31	17	17.56	9	59.18	32
21	36.99	27	32.74	11	43.71	94	40.48	15	17.47	9	59.50	29
22	36.72	26	32.85	9	42.77	89	40.63	14	17.38	9	59.79	28
23	36.46	24	32.94	9	41.88	84	40.77	14	17.29	9	60.07	27
24	36.22	24	33.03	9	41.04	81	40.91	13	17.20	8	60.34	26
25	35.98	23	33.12	11	40.23	80	41.04	14	17.12	7	60.60	27
26	35.75	24	33.23	11	39.43	81	41.18	16	17.05	6	60.87	28
27	35.51	25	33.34	12	38.62	84	41.34	17	16.99	6	61.15	29
28	35.26	27	33.46	12	37.78	90	41.51	16	16.93	8	61.44	30
29	34.99	28	33.58	12	36.88	97	41.67	16	16.85	10	61.74	32
30	34.71	30	33.70	11	35.91	103	41.83	16	16.75	11	62.06	32
31	34.41	32	33.81	8	34.88	108	41.99	14	16.64	13	62.38	31
32	34.09		33.89		33.80		42.13		16.51		62.69	
O. C.	$+0^s.29 \cos\varphi$				$+1^s.02 \cos\varphi$				$+0^s.26 \cos\varphi$			
U. C.	$-0.29 \cos\varphi$				$-1.02 \cos\varphi$				$-0.26 \cos\varphi$			

Bibl. Jag. Obere Culmination.

1902	51 Hev. Cephei. $5^m.1$.				1 Hev. Draconis. $4^m.3$.				ε Ursae minoris. $4^m.3$.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	$6^h\ 55^m$		$+87°\ 12'$		$9^h\ 23^m$		$+81°\ 45'$		$16^h\ 55^m$		$+82°\ 11'$	
Jan. 1	16.53	6	0.80	31	15.28	11	14.05	20	48.14	6	53.37	30
2	16.59	6	1.11	29	15.39	11	14.25	18	48.20	6	53.07	30
3	16.65	6	1.40	29	15.50	10	14.43	18	48.26	6	52.77	29
4	16.71	7	1.69	27	15.60	11	14.61	17	48.32	6	52.48	29
5	16.78	8	1.96	28	15.71	12	14.78	18	48.38	6	52.19	30
6	16.86	10	2.24	29	15.83	12	14.96	18	48.44	5	51.89	33
7	16.96	10	2.53	31	15.95	13	15.14	19	48.49	7	51.56	34
8	17.06	9	2.84	33	16.08	12	15.33	21	48.56	7	51.22	34
9	17.15	8	3.17	34	16.20	13	15.54	24	48.63	8	50.88	35
10	17.23	6	3.51	36	16.33	12	15.78	25	48.71	10	50.53	34
11	17.29	4	3.87	35	16.45	11	16.03	27	48.81	11	50.19	33
12	17.33	1	4.22	36	16.56	10	16.30	27	48.92	10	49.86	31
13	17.34	— 3	4.58	35	16.66	9	16.57	27	49.02	11	49.55	28
14	17.31	5	4.93	32	16.75	9	16.84	26	49.13	10	49.27	27
15	17.26	6	5.25	31	16.84	8	17.10	25	49.23	10	49.00	26
16	17.20	6	5.56	29	16.92	7	17.35	24	49.33	10	48.74	25
17	17.14	5	5.85	27	16.99	8	17.59	22	49.43	9	48.49	24
18	17.09	4	6.12	27	17.07	8	17.81	22	49.52	8	48.25	24
19	17.05	2	6.39	27	17.15	9	18.03	21	49.60	9	48.01	26
20	17.03	1	6.66	29	17.24	9	18.24	23	49.69	9	47.75	28
21	17.02	2	6.95	30	17.33	9	18.47	25	49.78	10	47.47	29
22	17.00	3	7.25	32	17.42	9	18.72	26	49.88	10	47.18	29
23	16.97	4	7.57	34	17.51	9	18.98	28	49.98	12	46.89	29
24	16.93	7	7.91	34	17.60	8	19.26	31	50.10	13	46.60	29
25	16.86	10	8.25	35	17.68	7	19.57	31	50.23	14	46.31	26
26	16.76	13	8.60	34	17.75	5	19.88	31	50.37	14	46.05	24
27	16.63	16	8.94	32	17.80	5	20.19	31	50.51	14	45.81	22
28	16.47	19	9.26	31	17.85	5	20.50	30	50.65	15	45.59	20
29	16.28	20	9.57	28	17.90	3	20.80	29	50.80	13	45.39	18
30	16.08	19	9.85	27	17.93	3	21.09	28	50.93	13	45.21	18
31	15.89	18	10.12	26	17.96	4	21.37	27	51.06	13	45.03	18
Febr. 1	15.71	16	10.38	25	18.00	3	21.64	27	51.19	12	44.85	18
2	15.55	15	10.63	26	18.03	4	21.91	27	51.31	12	44.67	20
3	15.40	15	10.89	28	18.07	5	22.18	27	51.43	12	44.47	20
4	15.25	15	11.17	28	18.12	4	22.45	29	51.55	13	44.27	22
5	15.10	16	11.45	29	18.16	5	22.74	32	51.68	14	44.05	22
6	14.94	17	11.74	31	18.21	5	23.06	32	51.82	15	43.83	22
7	14.77		12.05		18.26		23.38		51.97		43.61	
O. C.	+ 0ˢ.44 cos φ				+ 0ˢ.15 cos φ				+ 0ˢ.16 cos φ			
U. C.	— 0 .44 cos φ				— 0 .15 cos φ				— 0 .16 cos φ			

Obere Culmination.

1902	51 Hev. Cephei. 5ᵐ.1. AR.	Diff.	51 Hev. Cephei. Decl.	Diff.	1 Hev. Draconis. 4ᵐ.3. AR.	Diff.	1 Hev. Draconis. Decl.	Diff.	ε Ursae minoris. 4ᵐ.3. AR.	Diff.	ε Ursae minoris. Decl.	Diff.
	$6^h\ 55^m$		$+87°\ 12'$		$9^h\ 23^m$		$+81°\ 45'$		$16^h\ 55^m$		$+82°\ 11'$	
Febr. 7	14.77	20	12.05	31	18.26	4	23.38	34	51.97	16	43.61	20
8	14.57	22	12.36	31	18.30	2	23.72	34	52.13	16	43.41	19
9	14.35	25	12.67	30	18.32	2	24.06	34	52.29	17	43.22	16
10	14.10	28	12.97	27	18.34	0	24.40	33	52.46	17	43.06	13
11	13.82	29	13.24	26	18.34	0	24.73	32	52.63	15	42.93	12
12	13.53	29	13.50	24	18.34	0	25.05	29	52.78	15	42.81	10
13	13.24	29	13.74	22	18.34	1	25.34	28	52.93	15	42.71	10
14	12.95	27	13.96	21	18.33	1	25.62	27	53.08	13	42.61	10
15	12.68	26	14.17	20	18.32	1	25.89	26	53.21	13	42.51	11
16	12.42	24	14.37	21	18.31	— 1	26.15	27	53.34	14	42.40	12
17	12.18	23	14.58	23	18.32	1	26.42	28	53.48	14	42.28	13
18	11.95	24	14.81	23	18.33	1	26.70	29	53.62	15	42.15	14
19	11.71	25	15.04	25	18.34	1	26.99	32	53.77	16	42.01	14
20	11.46	27	15.29	25	18.35	1	27.31	32	53.93	17	41.87	12
21	11.19	30	15.54	25	18.36	— 1	27.63	33	54.10	17	41.75	11
22	10.89	33	15.79	25	18.35	2	27.96	35	54.27	18	41.64	9
23	10.56	36	16.04	24	18.33	4	28.31	34	54.45	17	41.55	7
24	10.20	38	16.28	22	18.29	5	28.65	32	54.62	18	41.48	4
25	9.82	39	16.50	20	18.24	4	28.97	31	54.80	17	41.44	3
26	9.43	40	16.70	18	18.20	5	29.28	29	54.97	17	41.41	1
27	9.03	38	16.88	16	18.15	6	29.57	28	55.14	16	41.40	0
28	8.65	36	17.04	15	18.09	5	29.85	27	55.30	15	41.40	1
März 1	8.29	34	17.19	14	18.04	4	30.12	27	55.45	14	41.39	2
2	7.95	33	17.33	16	18.00	4	30.39	26	55.59	16	41.37	3
3	7.62	32	17.49	16	17.96	4	30.65	27	55.75	15	41.34	3
4	7.30	33	17.65	17	17.92	3	30.92	29	55.90	15	41.31	4
5	6.97	34	17.82	19	17.89	4	31.21	31	56.05	17	41.27	4
6	6.63	36	18.01	19	17.85	5	31.52	32	56.22	17	41.23	4
7	6.27	38	18.20	18	17.80	5	31.84	31	56.39	19	41.19	1
8	5.89	41	18.38	18	17.75	6	32.15	32	56.58	18	41.18	— 1
9	5.48	43	18.56	16	17.69	7	32.47	31	56.76	17	41.19	3
10	5.05	44	18.72	14	17.62	8	32.78	29	56.93	17	41.22	6
11	4.61	44	18.86	11	17.54	9	33.07	27	57.10	17	41.28	6
12	4.17	44	18.97	9	17.45	8	33.34	25	57.27	16	41.34	8
13	3.73	42	19.06	7	17.37	8	33.59	24	57.43	15	41.42	8
14	3.31	41	19.13	7	17.29	9	33.83	22	57.58	14	41.50	8
15	2.90	38	19.20	7	17.20	7	34.05	22	57.72	14	41.58	6
16	2.52		19.27		17.13		34.27		57.86		41.64	
O. C.	$+0^s.44 \cos\varphi$				$+0^s.15 \cos\varphi$				$+0^s.16 \cos\varphi$			
U. C.	$-0.44 \cos\varphi$				$-0.15 \cos\varphi$				$-0.16 \cos\varphi$			

Obere Culmination.

1902	51 Hev. Cephei. $5^m.1$. AR.		Decl.		1 Hev. Draconis. $4^m.3$. AR.		Decl.		ε Ursae minoris. $4^m.3$. AR.		Decl.	
	$6^h\ 54^m$		$+87°\ 12'$		$9^h\ 23^m$		$+81°\ 45'$		$16^h\ 55^m$		$+82°\ 11'$	
März 16	$62^s.52$	37	$19''.27$	7	$17^s.13$	7	$34''.27$	22	$57^s.86$	14	$41''.64$	6
17	62.15	36	19.34	9	17.06	7	34.49	23	58.00	15	41.70	5
18	61.79	37	19.43	10	16.99	7	34.72	25	58.15	15	41.75	4
19	61.42	38	19.53	10	16.92	7	34.97	27	58.30	16	41.79	4
20	61.04	40	19.63	11	16.85	8	35.24	27	58.46	16	41.83	6
21	60.64	42	19.74	11	16.77	8	35.51	28	58.62	18	41.89	8
22	60.22	46	19.85	9	16.69	11	35.79	26	58.80	17	41.97	11
23	59.76	47	19.94	7	16.58	11	36.05	26	58.97	16	42.08	13
24	59.29	48	20.01	5	16.47	12	36.31	25	59.13	17	42.21	15
25	58.81	49	20.06	3	16.35	11	36.56	22	59.30	15	42.36	16
26	58.32	47	20.09	1	16.24	12	36.78	20	59.45	15	42.52	17
27	57.85	45	20.10	0	16.12	12	36.98	19	59.60	14	42.69	17
28	57.40	43	20.10	1	16.00	11	37.17	18	59.74	13	42.86	16
29	56.97	41	20.09	1	15.89	11	37.35	18	59.87	13	43.02	15
30	56.56	40	20.08	0	15.78	10	37.53	18	60.00	13	43.17	13
31	56.16	38	20.08	1	15.68	9	37.71	19	60.13	13	43.30	13
April 1	55.78	39	20.09	2	15.59	10	37.90	20	60.26	14	43.43	13
2	55.39	41	20.11	2	15.49	10	38.10	22	60.40	15	43.56	13
3	54.98	43	20.13	3	15.39	11	38.32	21	60.55	15	43.69	15
4	54.55	44	20.16	2	15.28	12	38.53	22	60.70	16	43.84	16
5	54.11	46	20.18	0	15.16	12	38.75	20	60.86	15	44.00	18
6	53.65	48	20.18	1	15.04	13	38.95	19	61.01	14	44.18	21
7	53.17	47	20.17	4	14.91	14	39.14	17	61.15	14	44.39	23
8	52.70	46	20.13	6	14.77	15	39.31	15	61.29	12	44.62	23
9	52.24	44	20.07	9	14.62	14	39.46	13	61.41	12	44.85	25
10	51.80	43	19.98	9	14.48	13	39.59	11	61.53	12	45.10	24
11	51.37	40	19.89	10	14.35	13	39.70	10	61.65	10	45.34	22
12	50.97	38	19.79	10	14.22	12	39.80	11	61.75	10	45.56	21
13	50.59	36	19.69	8	14.10	11	39.91	10	61.85	10	45.77	19
14	50.23	36	19.61	8	13.99	11	40.01	12	61.95	11	45.96	19
15	49.87	36	19.53	6	13.88	12	40.13	13	62.06	11	46.15	19
16	49.51	38	19.47	5	13.76	11	40.26	14	62.17	12	46.34	21
17	49.13	41	19.42	7	13.65	13	40.40	15	62.29	12	46.55	22
18	48.72	43	19.35	6	13.52	13	40.55	15	62.41	13	46.77	25
19	48.29	44	19.29	7	13.39	15	40.70	13	62.54	13	47.02	26
20	47.85	45	19.22	10	13.24	15	40.83	11	62.67	11	47.28	28
21	47.40	44	19.12	13	13.09	15	40.94	10	62.78	11	47.56	30
22	46.96		18.99		12.94		41.04		62.89		47.86	
O. C.	$+0^s.44\cos\varphi$				$+0^s.15\cos\varphi$				$+0^s.16\cos\varphi$			
U. C.	$-0\ .44\cos\varphi$				$-0\ .15\cos\varphi$				$-0\ .16\cos\varphi$			

Obere Culmination.

1902	51 Hev. Cephei. 5ᵐ.1. AR.	Δ	51 Hev. Cephei. Decl.	Δ	1 Hev. Draconis. 4ᵐ.3. AR.	Δ	1 Hev. Draconis. Decl.	Δ	ε Ursae minoris. 4ᵐ.3. AR.	Δ	ε Ursae minoris. Decl.	Δ
	6ʰ 54ᵐ		+87° 12′		9ʰ 23ᵐ		+81° 45′		16ʰ 56ᵐ		+82° 11′	
April 22	46ˢ.96	44	18″.99	15	12ˢ.94	15	41″.04	8	2ˢ.89	10	47″.86	30
23	46.52	42	18.84	16	12.79	16	41.12	6	2.99	9	48.16	30
24	46.10	39	18.68	16	12.63	15	41.18	4	3.08	9	48.46	29
25	45.71	36	18.52	17	12.48	14	41.22	3	3.17	8	48.75	28
26	45.35	34	18.35	17	12.34	13	41.25	3	3.25	7	49.03	27
27	45.01	33	18.18	15	12.21	13	41.28	5	3.32	8	49.30	25
28	44.68	33	18.03	14	12.08	12	41.33	5	3.40	8	49.55	25
29	44.35	33	17.89	13	11.96	13	41.38	7	3.48	9	49.80	25
30	44.02	34	17.76	13	11.83	12	41.45	7	3.57	9	50.05	26
Mai 1	43.68	36	17.63	13	11.71	14	41.52	7	3.66	9	50.31	27
2	43.32	37	17.50	14	11.57	14	41.59	7	3.75	9	50.58	29
3	42.95	38	17.36	16	11.43	15	41.66	5	3.84	8	50.87	31
4	42.57	39	17.20	18	11.28	16	41.71	2	3.92	8	51.18	32
5	42.18	38	17.02	20	11.12	15	41.73	0	4.00	7	51.50	34
6	41.80	36	16.82	22	10.97	16	41.73	2	4.07	6	51.84	35
7	41.44	33	16.60	24	10.81	15	41.71	5	4.13	5	52.19	34
8	41.11	29	16.36	24	10.66	14	41.66	5	4.18	4	52.53	32
9	40.82	28	16.12	25	10.52	12	41.61	5	4.22	3	52.85	31
10	40.54	26	15.87	23	10.40	12	41.56	5	4.25	3	53.16	29
11	40.28	24	15.64	21	10.28	12	41.51	4	4.28	3	53.45	28
12	40.04	24	15.43	21	10.16	12	41.47	3	4.31	5	53.73	27
13	39.80	25	15.22	19	10.04	13	41.44	1	4.36	5	54.00	28
14	39.55	27	15.03	19	9.91	12	41.43	1	4.41	6	54.28	29
15	39.28	29	14.84	19	9.79	13	41.42	1	4.47	5	54.57	31
16	38.99	30	14.65	20	9.66	14	41.41	1	4.52	6	54.88	32
17	38.69	31	14.45	23	9.52	14	41.40	3	4.58	5	55.20	34
18	38.38	31	14.22	24	9.38	16	41.37	5	4.63	4	55.54	36
19	38.07	30	13.98	25	9.22	15	41.32	7	4.67	2	55.90	37
20	37.77	28	13.73	28	9.07	14	41.25	9	4.69	2	56.27	37
21	37.49	26	13.45	29	8.93	14	41.16	12	4.71	1	56.64	36
22	37.23	22	13.16	29	8.79	14	41.04	12	4.72	0	57.00	34
23	37.01	20	12.87	29	8.65	12	40.92	12	4.72	1	57.34	32
24	36.81	18	12.58	27	8.53	12	40.80	12	4.73	1	57.66	31
25	36.63	16	12.31	26	8.41	12	40.68	10	4.74	0	57.97	30
26	36.47	16	12.05	24	8.29	11	40.58	10	4.74	1	58.27	29
27	36.31	18	11.81	23	8.18	11	40.48	9	4.75	1	58.56	29
28	36.13	19	11.58	23	8.07	11	40.39	8	4.76	2	58.85	30
29	35.94		11.35		7.96		40.31		4.78		59.15	
O. C.	+ 0ˢ.44 cos φ				+ 0ˢ.15 cos φ				+ 0ˢ.16 cos φ			
U. C.	— 0 .44 cos φ				— 0 .15 cos φ				— 0 .16 cos φ			

Obere Culmination.

1902	51 Hev. Cephei. 5m.1. AR.		Decl.		1 Hev. Draconis. 4m.3. AR.		Decl.		ε Ursae minoris. 4m.3. AR.		Decl.	
	6h 54m		+87° 12′		9h 23m		+81° 45′		16h 56m		+82° 11′	
	s		″		s		″		s		″	
Mai 29	35.94	20	11.35	25	7.96	12	40.31	8	4.78	2	59.15	32
30	35.74	21	11.10	25	7.84	13	40.23	10	4.80	2	59.47	34
31	35.53	20	10.85	27	7.71	13	40.13	11	4.82	0	59.81	34
Juni 1	35.33	21	10.58	29	7.58	14	40.02	14	4.82	0	60.15	36
2	35.12	19	10.29	32	7.44	13	39.88	16	4.82	2	60.51	37
3	34.93	16	9.97	33	7.31	12	39.72	18	4.80	3	60.88	37
4	34.77	13	9.64	33	7.19	12	39.54	19	4.77	4	61.25	35
5	34.64	10	9.31	33	7.07	11	39.35	20	4.73	4	61.60	34
6	34.54	8	8.98	32	6.96	10	39.15	21	4.69	3	61.94	31
7	34.46	7	8.66	31	6.86	9	38.94	19	4.66	4	62.25	30
8	34.39	5	8.35	29	6.77	9	38.75	19	4.62	4	62.55	28
9	34.34	5	8.06	28	6.68	9	38.56	16	4.58	3	62.83	28
10	34.29	8	7.78	27	6.59	9	38.40	15	4.55	3	63.11	28
11	34.21	9	7.51	26	6.50	10	38.25	15	4.52	2	63.39	30
12	34.12	10	7.25	27	6.40	11	38.10	15	4.50	3	63.69	31
13	34.02	11	6.98	29	6.29	11	37.95	16	4.47	2	64.00	33
14	33.91	11	6.69	31	6.18	11	37.79	18	4.45	4	64.33	35
15	33.80	10	6.38	32	6.07	11	37.61	20	4.41	4	64.68	36
16	33.70	9	6.06	33	5.96	12	37.41	23	4.37	5	65.04	35
17	33.61	7	5.73	34	5.84	10	37.18	23	4.32	6	65.39	33
18	33.54	3	5.39	35	5.74	11	36.95	25	4.26	6	65.72	33
19	33.51	1	5.04	34	5.63	9	36.70	24	4.20	8	66.05	31
20	33.50	— 2	4.70	33	5.54	8	36.46	24	4.12	7	66.36	28
21	33.52	4	4.37	32	5.46	6	36.22	24	4.05	7	66.64	28
22	33.56	5	4.05	30	5.40	7	35.98	22	3.98	6	66.92	26
23	33.61	3	3.75	29	5.33	6	35.76	21	3.92	6	67.18	26
24	33.64	2	3.46	28	5.27	7	35.55	20	3.86	6	67.44	26
25	33.66	1	3.18	27	5.20	7	35.35	20	3.80	5	67.70	27
26	33.67	0	2.91	29	5.13	8	35.15	21	3.75	7	67.97	29
27	33.67	0	2.62	30	5.05	9	34.94	23	3.68	6	68.26	31
28	33.67	0	2.32	33	4.96	9	34.71	24	3.62	7	68.57	32
29	33.67	1	1.99	34	4.87	9	34.47	27	3.55	8	68.89	32
30	33.68	3	1.65	35	4.78	8	34.20	28	3.47	10	69.21	31
Juli 1	33.71	7	1.30	36	4.70	7	33.92	31	3.37	11	69.52	31
2	33.78	9	0.94	36	4.63	7	33.61	31	3.26	11	69.83	29
3	33.87	12	0.58	35	4.56	5	33.30	32	3.15	11	70.12	27
4	33.99		0.23		4.51		32.98		3.04		70.39	
O. C.	+ 0s.44 cos φ				+ 0s.15 cos φ				+ 0s.16 cos φ			
U. C.	— 0 .44 cos φ				— 0 .15 cos φ				— 0 .16 cos φ			

Obere Culmination.

1902		51 Hev. Cephei. $5^m.1$. AR.		Decl.		1 Hev. Draconis. $4^m.3$. AR.		Decl.		ε Ursae minoris. $4^m.3$. AR.		Decl.	
		$6^h\ 54^m$		$+87°\ 11'$		$9^h\ 23^m$		$+81°\ 45'$		$16^h\ 55^m$		$+82°\ 12'$	
Juli	4	33.99	15	60.23	34	4.51	5	32.98	30	63.04	11	10.39	24
	5	34.14	16	59.89	32	4.46	4	32.68	29	62.93	11	10.63	22
		34.30	15	59.57	29								
	6	34.45	14	59.28	29	4.42	3	32.39	29	62.82	11	10.85	22
	7	34.59	13	58.99	27	4.39	4	32.10	27	62.71	9	11.07	22
	8	34.72	12	58.72	28	4.35	5	31.83	26	62.62	9	11.29	23
	9	34.84	10	58.44	29	4.30	4	31.57	25	62.53	9	11.52	24
	10	34.94	8	58.15	31	4.26	6	31.32	26	62.44	10	11.76	24
	11	35.02	10	57.84	32	4.20	6	31.06	27	62.34	9	12.00	26
	12	35.12	11	57.52	33	4.14	5	30.79	28	62.25	10	12.26	28
	13	35.23	13	57.19	34	4.09	6	30.51	30	62.15	11	12.54	28
	14	35.36	16	56.85	35	4.03	6	30.21	32	62.04	13	12.82	27
	15	35.52	19	56.50	34	3.97	5	29.89	33	61.91	13	13.09	26
	16	35.71	22	56.16	33	3.92	3	29.56	34	61.78	13	13.35	24
	17	35.93	23	55.83	31	3.89	2	29.22	33	61.65	13	13.59	22
	18	36.16	24	55.52	29	3.87	2	28.89	33	61.52	15	13.81	20
	19	36.40	25	55.23	28	3.85	1	28.56	31	61.37	13	14.01	18
	20	36.65	23	54.95	27	3.84	1	28.25	29	61.24	13	14.19	17
	21	36.88	22	54.68	26	3.83	1	27.96	29	61.11	12	14.36	18
	22	37.10	21	54.42	26	3.82	1	27.67	29	60.99	11	14.54	18
	23	37.31	19	54.16	28	3.81	2	27.38	28	60.88	11	14.72	19
	24	37.50	19	53.88	29	3.79	2	27.10	29	60.77	13	14.91	20
	25	37.69	20	53.59	31	3.77	2	26.81	30	60.64	13	15.11	22
	26	37.89	22	53.28	31	3.75	3	26.51	33	60.51	13	15.33	22
	27	38.11	24	52.97	33	3.72	3	26.18	35	60.38	15	15.55	22
	28	38.35	28	52.64	33	3.69	2	25.83	36	60.23	15	15.77	21
	29	38.63	30	52.31	32	3.67	1	25.47	38	60.08	16	15.98	19
	30	38.93	32	51.99	30	3.66	1	25.09	37	59.92	17	16.17	17
	31	39.25	34	51.69	29	3.67	2	24.72	36	59.75	17	16.34	15
Aug.	1	39.59	35	51.40	27	3.69	1	24.36	35	59.58	16	16.49	13
	2	39.94	34	51.13	25	3.70	2	24.01	33	59.42	16	16.62	12
	3	40.28	32	50.88	25	3.72	3	23.68	32	59.26	15	16.74	11
	4	40.60	31	50.63	23	3.75	2	23.36	30	59.11	14	16.85	12
	5	40.91	29	50.40	24	3.77	2	23.06	30	58.97	14	16.97	12
	6	41.20	28	50.16	25	3.79	0	22.76	31	58.83	14	17.09	14
	7	41.48	27	49.91	27	3.79	1	22.45	31	58.69	14	17.23	14
	8	41.75	28	49.64	27	3.80	0	22.14	33	58.55	14	17.37	16
	9	42.03		49.37		3.80		21.81		58.41		17.53	
O. C.		$+0^s.44 \cos\varphi$				$+0^s.15 \cos\varphi$				$+0^s.16 \cos\varphi$			
U. C.		$-0.44 \cos\varphi$				$-0.15 \cos\varphi$				$-0.16 \cos\varphi$			

Obere Culmination.

1902	51 Hev. Cephei. $5^m.1$.				1 Hev. Draconis. $4^m.3$.				ε Ursae minoris. $4^m.3$.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	$6^h\ 54^m$		$+87°\ 11'$		$9^h\ 23^m$		$+81°\ 45'$		$16^h\ 55^m$		$+82°\ 12'$	
Aug. 9	$42^s.03$	30	$49''.37$	29	$3^s.80$	1	$21''.81$	34	$58^s.41$	16	$17''.53$	17
10	42.33	32	49.08	28	3.81	0	21.47	35	58.25	16	17.70	15
11	42.65	35	48.80	29	{ 3.81 { 3.83	2 2	{ 21.12 { 20.75	37 38	58.09	17	17.85	15
12	43.00	37	48.51	28	3.85	4	20.37	38	57.92	18	18.00	12
13	43.37	40	48.23	26	3.89	5	19.99	36	57.74	17	18.12	10
14	43.77	42	47.97	24	3.94	5	19.63	35	57.57	17	18.22	9
15	44.19	41	47.73	22	3.99	5	19.28	33	57.40	18	18.31	6
16	44.60	39	47.51	20	4.04	4	18.95	32	57.22	17	18.37	5
17	44.99	39	47.31	20	4.08	5	18.63	30	57.05	16	18.42	5
18	45.38	38	47.11	19	4.13	4	18.33	31	56.89	16	18.47	5
19	45.76	36	46.92	21	4.17	4	18.02	31	56.73	15	18.52	6
20	46.12	34	46.71	21	4.21	4	17.71	32	56.58	15	18.58	8
21	46.46	35	46.50	23	4.25	4	17.39	33	56.43	16	18.66	9
22	46.81	37	46.27	24	4.29	3	17.06	35	56.27	17	18.75	9
23	47.18	39	46.03	26	4.32	4	16.71	37	56.10	17	18.84	10
24	47.57	41	45.77	25	4.36	5	16.34	38	55.93	19	18.94	8
25	47.98	44	45.52	25	4.41	6	15.96	37	55.74	19	19.02	7
26	48.42	46	45.27	23	4.47	7	15.59	38	55.55	20	19.09	5
27	48.88	48	45.04	21	4.54	8	15.21	36	55.35	20	19.14	3
28	49.36	49	44.83	20	4.62	7	14.85	34	55.15	19	19.17	0
29	49.85	48	44.63	17	4.69	9	14.51	33	54.96	18	19.17	1
30	50.33	47	44.46	16	4.78	9	14.18	31	54.78	18	19.16	2
31	50.80	45	44.30	15	4.87	7	13.87	30	54.60	16	19.14	3
Sept. 1	51.25	43	44.15	14	4.94	8	13.57	29	54.44	17	19.11	2
2	51.68	42	44.01	16	5.02	7	13.28	30	54.27	16	19.09	1
3	52.10	40	43.85	17	5.09	6	12.98	31	54.11	16	19.08	— 1
4	52.50	41	43.68	17	5.15	6	12.67	32	53.95	17	19.09	2
5	52.91	42	43.51	20	5.21	7	12.35	35	53.78	17	19.11	4
6	53.33	43	43.31	19	5.28	6	12.00	35	53.61	18	19.15	2
7	53.76	46	43.12	20	5.34	7	11.65	36	53.43	18	19.17	1
8	54.22	48	42.92	19	5.41	9	11.29	35	53.25	19	19.18	1
9	54.70	51	42.73	17	5.50	10	10.94	35	53.06	20	19.19	— 2
10	55.21	52	42.56	15	5.60	11	10.59	33	52.86	19	19.17	5
11	55.73	52	42.41	13	5.71	11	10.26	32	52.67	19	19.12	7
12	56.25	52	42.28	11	5.82	12	9.94	30	52.48	17	19.05	8
13	56.77	50	42.17	9	5.94	11	9.64	29	52.31	18	18.97	9
14	57.27		42.08		6.05		9.35		52.13		18.88	
O. C.	$+0^s.44\cos\varphi$				$+0^s.15\cos\varphi$				$+0^s.16\cos\varphi$			
U. C.	$-0.44\cos\varphi$				$-0.15\cos\varphi$				$-0.16\cos\varphi$			

Obere Culmination.

1902	51 Hev. Cephei. $5^m.1$. AR.		Decl.		1 Hev. Draconis. $4^m.3$. AR.		Decl.		ε Ursae minoris. $4^m.3$. AR.		Decl.	
	$6^h\ 54^m$		$+87°\ 11'$		$9^h\ 23^m$		$+81°\ 44'$		$16^h\ 55^m$		$+82°\ 12'$	
Sept. 14	$57^s.27$	49	$42''.08$	9	$6^s.05$	10	$69''.35$	27	$52^s.13$	16	$18''.88$	9
15	57.76	46	41.99	10	6.15	10	69.08	27	51.97	17	18.79	8
16	58.22	45	41.89	10	6.25	10	68.81	28	51.80	16	18.71	7
17	58.67	45	41.79	11	6.35	9	68.53	30	51.64	15	18.64	5
18	59.12	46	41.68	13	6.44	9	68.23	31	51.49	17	18.59	5
19	59.58	46	41.55	14	6.53	9	67.92	32	51.32	18	18.54	5
20	60.04	49	41.41	14	6.62	10	67.60	34	51.14	19	18.49	4
21	60.53	53	41.27	14	6.72	11	67.26	34	50.95	19	18.45	6
22	61.06	54	41.13	14	6.83	12	66.92	33	50.76	19	18.39	8
23	61.60	55	40.99	11	6.95	13	66.59	32	50.57	20	18.31	11
24	62.15	57	40.88	9	7.08	14	66.27	31	50.37	19	18.20	12
25	62.72	56	40.79	7	7.22	14	65.96	29	50.18	19	18.08	14
26	63.28	55	40.72	5	7.36	13	65.67	26	49.99	18	17.94	16
27	63.83	54	40.67	3	7.49	13	65.41	25	49.81	17	17.78	16
28	64.37	50	40.64	3	7.62	13	65.16	25	49.64	16	17.62	15
29	64.87	49	40.61	3	7.75	13	64.91	24	49.48	16	17.47	14
30	65.36	48	40.58	5	7.88	12	64.67	25	49.32	15	17.33	14
Oct. 1	65.84	46	40.53	6	8.00	11	64.42	26	49.17	15	17.19	12
2	66.30	47	40.47	7	8.11	12	64.16	27	49.02	16	17.07	11
3	66.77	49	40.40	7	8.23	12	63.89	28	48.86	17	16.96	11
4	67.26	50	40.33	8	8.35	12	63.61	29	48.69	17	16.85	12
5	67.76	53	40.25	7	8.47	13	63.32	29	48.52	18	16.73	13
6	68.29	54	40.18	5	8.60	15	63.03	28	48.34	17	16.60	15
7	68.83	57	40.13	4	8.75	15	62.75	27	48.17	17	16.45	17
8	69.40	57	40.09	1	8.90	15	62.48	25	48.00	18	16.28	20
9	69.97	56	40.08	— 1	9.05	16	62.23	23	47.82	16	16.08	21
10	70.53	54	40.09	3	9.21	15	62.00	21	47.66	16	15.87	22
11	71.07	53	40.12	3	9.36	15	61.79	20	47.50	15	15.65	22
12	71.60	50	40.15	3	9.51	15	61.59	19	47.35	14	15.43	22
13	72.10	49	40.18	4	9.66	14	61.40	20	47.21	14	15.21	21
14	72.59	47	40.22	2	9.80	14	61.20	20	47.07	14	15.00	20
15	73.06	47	40.24	0	9.94	13	61.00	22	46.93	14	14.80	19
16	73.53	48	40.24	1	10.07	14	60.78	22	46.79	14	14.61	18
17	74.01	50	40.23	1	10.21	13	60.56	24	46.65	15	14.43	18
18	74.51	53	40.22	1	10.34	15	60.32	25	46.50	16	14.25	18
19	75.04	54	40.21	1	10.49	16	60.07	25	46.34	16	14.07	20
20	75.58	57	40.20	— 1	10.65	17	59.82	23	46.18	17	13.87	21
21	76.15		40.21		10.82		59.59		46.01		13.66	
O. C.	$+ 0^s.44 \cos\varphi$				$+ 0^s.15 \cos\varphi$				$+ 0^s.16 \cos\varphi$			
U. C.	$- 0.44 \cos\varphi$				$- 0.15 \cos\varphi$				$- 0.16 \cos\varphi$			

Obere Culmination.

1902	51 Hev. Cephei. $5^m.1$. AR.	Diff.	Decl.	Diff.	1 Hev. Draconis. $4^m.3$. AR.	Diff.	Decl.	Diff.	ε Ursae minoris. $4^m.3$. AR.	Diff.	Decl.	Diff.
	$6^h\ 55^m$		$+87°\ 11'$		$9^h\ 23^m$		$+81°\ 44'$		$16^h\ 55^m$		$+82°\ 12'$	
Oct. 21	$16^s.15$	57	$40''.21$	3	$10^s.82$	18	$59''.59$	22	$45^s.01$	16	$13''.66$	24
22	16.72	56	40.24	6	11.00	18	59.37	20	45.85	16	13.42	26
23	17.28	56	40.30	7	11.18	17	59.17	18	45.69	14	13.16	28
24	17.84	54	40.37	9	11.35	18	58.99	16	45.55	14	12.88	28
25	18.38	51	40.46	10	11.53	17	58.83	14	45.41	13	12.60	29
26	18.89	49	40.56	11	11.70	15	58.69	14	45.28	11	12.31	27
27	19.38	46	40.67	9	11.85	15	58.55	14	45.17	12	12.04	25
28	19.84	46	40.76	8	12.00	16	58.41	14	45.05	11	11.79	25
29	20.30	44	40.84	8	12.16	15	58.27	16	44.94	12	11.54	23
30	20.74	46	40.92	6	12.31	15	58.11	16	44.82	12	11.31	23
31	21.20	48	40.98	6	12.46	15	57.95	18	44.70	12	11.08	23
Nov. 1	21.68	48	41.04	7	12.61	16	57.77	17	44.58	13	10.85	24
2	22.16	51	41.11	7	12.77	18	57.60	17	44.45	13	10.61	26
3	22.67	53	41.18	9	12.95	18	57.43	16	44.32	14	10.35	28
4	23.20	52	41.27	11	13.13	18	57.27	14	44.18	12	10.07	30
5	23.72	52	41.38	14	13.31	18	57.13	12	44.06	12	9.77	32
6	24.24	51	41.52	15	13.49	19	57.01	9	43.94	11	9.45	33
7	24.75	49	41.67	17	13.68	18	56.92	8	43.83	10	9.12	32
8	25.24	46	41.84	17	13.86	17	56.84	7	43.73	10	8.80	33
9	25.70	44	42.01	16	14.03	17	56.77	6	43.63	8	8.47	32
10	26.14	42	42.17	16	14.20	16	56.71	8	43.55	9	8.15	30
11	26.56	41	42.33	14	14.36	16	56.63	8	43.46	8	7.85	29
12	26.97	41	42.47	14	14.52	16	56.55	9	43.38	8	7.56	28
13	27.38	42	42.61	12	14.68	17	56.46	12	43.30	9	7.28	27
14	27.80	44	42.73	11	14.85	16	56.34	12	43.21	10	7.01	28
15	28.24	46	42.84	12	15.01	18	56.22	11	43.11	10	6.73	30
16	28.70	48	42.96	14	15.19	18	56.11	11	43.01	11	6.43	30
17	29.18	49	43.10	16	15.37	19	56.00	10	42.90	10	6.13	33
18	29.67	49	43.26	18	15.56	19	55.90	7	42.80	10	5.80	35
19	30.16	48	43.44	20	15.75	19	55.83	5	42.70	8	5.45	36
20	30.64	46	43.64	22	15.94	19	55.78	2	42.62	8	5.09	38
21	31.10	42	43.86	23	16.13	19	55.76	1	42.54	6	4.71	37
22	31.52	40	44.09	23	16.32	18	55.75	0	42.48	6	4.34	36
23	31.92	37	44.32	23	16.50	16	55.75	0	42.42	5	3.98	35
24	32.29	35	44.55	21	16.66	15	55.75	0	42.37	5	3.63	34
25	32.64	34	44.76	21	16.81	16	55.75	1	42.32	4	3.29	32
26	32.98	34	44.97	19	16.97	16	55.74	2	42.28	5	2.97	31
27	33.32		45.16		17.13		55.72		42.23		2.66	
O. C.	$+0^s.44 \cos\varphi$				$+0^s.15 \cos\varphi$				$+0^s.16 \cos\varphi$			
U. C.	$-0\ .44 \cos\varphi$				$-0\ .15 \cos\varphi$				$-0\ .16 \cos\varphi$			

Obere Culmination.

1902	51 Hev. Cephei. $5^m.1$.				1 Hev. Draconis. $4^m.3$.				ε Ursae minoris. $4^m.3$.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	$6^h\ 55^m$		$+87^\circ\ 11'$		$9^h\ 23^m$		$+81^\circ\ 44'$		$16^h\ 55^m$		$+82^\circ\ 11'$	
	s		"		s		"		s		"	
Nov. 27	33.32	35	45.16	18	17.13	16	55.72	3	42.23	5	62.66	30
28	33.67	36	45.34	19	17.29	17	55.69	2	42.18	6	62.36	31
29	34.03	39	45.53	20	17.46	16	55.67	2	42.12	6	62.05	32
30	34.42	40	45.73	20	17.62	18	55.65	2	42.06	5	61.73	33
Dec. 1	34.82	40	45.93	23	17.80	18	55.63	0	42.01	6	61.40	36
2	35.22	39	46.16	25	17.98	19	55.63	3	41.95	4	61.04	38
3	35.61	38	46.41	27	18.17	18	55.66	5	41.91	4	60.66	38
4	35.99	35	46.68	27	18.35	19	55.71	7	41.87	3	60.28	38
5	36.34	33	46.95	29	18.54	17	55.78	8	41.84	3	59.90	38
6	36.67	30	47.24	29	18.71	17	55.86	9	41.81	1	59.52	37
7	36.97	28	47.53	27	18.88	15	55.95	9	{ 41.80	0	{ 59.15	36
									{ 41.80	1	{ 58.79	34
8	37.25	26	47.80	27	19.03	15	56.04	8	41.79	0	58.45	33
9	37.51	25	48.07	25	19.18	16	56.12	7	41.79	1	58.12	32
10	37.76	26	48.32	24	19.34	15	56.19	5	41.78	2	57.80	32
11	38.02	28	48.56	23	19.49	15	56.24	5	41.76	1	57.48	32
12	38.30	29	48.79	23	19.64	16	56.29	5	41.75	2	57.16	34
13	38.59	30	49.02	23	19.80	16	56.34	5	41.73	3	56.82	36
14	38.89	32	49.25	26	19.96	18	56.39	5	41.70	1	56.46	38
15	39.21	32	49.51	27	20.14	17	56.44	8	41.69	1	56.08	39
16	39.53	30	49.78	29	20.31	18	56.52	10	41.68	0	55.69	40
17	39.83	28	50.07	32	20.49	17	56.62	12	41.68	1	55.29	40
18	40.11	26	50.39	32	20.66	16	56.74	14	41.69	2	54.89	38
19	40.37	22	50.71	33	20.82	16	56.88	16	41.71	4	54.51	37
20	40.59	20	51.04	32	20.98	14	57.04	15	41.75	4	54.14	35
21	40.79	17	51.36	32	21.12	14	57.19	16	41.79	4	53.79	34
22	40.96	14	51.68	30	21.26	14	57.35	15	41.83	3	53.45	33
23	41.10	14	51.98	29	21.40	12	57.50	14	41.86	4	53.12	32
24	41.24	15	52.27	27	21.52	13	57.64	13	41.90	3	52.80	31
25	41.39	16	52.54	26	21.65	13	57.77	12	41.93	2	52.49	32
26	41.55	17	52.80	28	21.78	13	57.89	13	41.95	3	52.17	33
27	41.72	18	53.08	28	21.91	15	58.02	14	41.98	3	51.84	34
28	41.90	19	53.36	30	22.06	15	58.16	15	42.01	4	51.50	35
29	42.09	18	53.66	31	22.21	14	58.31	16	42.05	4	51.15	37
30	42.27	18	53.97	33	22.35	15	58.47	19	42.09	5	50.78	38
31	42.45	15	54.30	35	22.50	14	58.66	21	42.14	7	50.40	38
32	42.60		54.65		22.64		58.87		42.21		50.02	
O. C.	$+0^s.44 \cos\varphi$				$+0^s.15 \cos\varphi$				$+0^s.16 \cos\varphi$			
U. C.	$-0.44 \cos\varphi$				$-0.15 \cos\varphi$				$-0.16 \cos\varphi$			

Obere Culmination.

1902	δ Ursae minoris. $4^m.3$. AR.		Decl.		λ Ursae minoris. $6^m.4$. AR.		Decl.		76 Draconis. $6^m.0$. AR.		Decl.	
	$18^h\ 3^m$		+86° 36′		$19^h\ 18^m$		+88° 59′		$20^h\ 49^m$		+82° 10′	
Jan. 1	26.64	4	52.51	32	51.45	26	41.75	33	35.46	8	26.29	28
2	26.68	4	52.19	30	51.19	25	41.42	30	35.38	9	26.01	27
3	26.72	3	51.89	29	50.94	26	41.12	29	35.29	8	25.74	25
4	26.75	2	51.60	31	50.68	29	40.83	28	35.21	8	25.49	25
5	26.77	1	51.29	31	50.39	33	40.55	28	35.13	8	25.24	23
6	26.78	1	50.98	32	50.06	37	40.27	29	35.05	8	25.01	25
7	26.79	2	50.66	35	49.69	38	39.98	31	34.97	9	24.76	26
8	26.81	4	50.31	36	49.31	37	39.67	32	34.88	10	24.50	28
					48.94	33	39.35	34				
9	26.85	7	49.95	36	48.61	27	39.01	36	34.78	9	24.22	30
10	26.92	9	49.59	37	48.34	19	38.65	36	34.69	10	23.92	31
11	27.01	10	49.22	35	48.15	11	38.29	36	34.59	8	23.61	33
12	27.11	12	48.87	34	48.04	3	37.93	35	34.51	7	23.28	33
13	27.23	14	48.53	33	48.01	— 3	37.58	34	34.44	6	22.95	34
14	27.37	14	48.20	30	48.04	6	37.24	33	34.38	5	22.61	33
15	27.51	13	47.90	29	48.10	6	36.91	30	34.33	5	22.28	32
16	27.64	13	47.61	28	48.16	4	36.61	29	34.28	3	21.96	29
17	27.77	11	47.33	27	48.20	1	36.32	29	34.25	5	21.67	28
18	27.88	10	47.06	28	48.21	— 4	36.03	29	34.20	4	21.39	27
19	27.98	9	46.78	29	48.17	6	35.74	30	34.16	5	21.12	27
20	28.07	11	46.49	31	48.11	6	35.44	31	34.11	5	20.85	29
21	28.18	11	46.18	32	48.05	4	35.13	33	34.06	6	20.56	29
22	28.29	13	45.86	34	48.01	0	34.80	35	34.00	6	20.27	31
23	28.42	16	45.52	34	48.01	8	34.45	35	33.94	6	19.96	33
24	28.58	18	45.18	32	48.09	17	34.10	36	33.88	4	19.63	35
25	28.76	21	44.86	32	48.26	27	33.74	36	33.84	4	19.28	35
26	28.97	23	44.54	30	48.53	35	33.38	34	33.80	3	18.93	37
27	29.20	24	44.24	28	48.88	41	33.04	33	33.77	1	18.56	36
28	29.44	24	43.96	26	49.29	43	32.71	31	33.76	0	18.20	36
29	29.68	23	43.70	25	49.72	43	32.40	29	33.76	0	17.84	33
30	29.91	22	43.45	23	50.15	42	32.11	27	33.76	1	17.51	32
									33.77	0	17.19	31
31	30.13	22	43.22	23	50.57	37	31.84	28	33.77	0	16.88	29
Febr. 1	30.35	20	42.99	23	50.94	33	31.56	27	33.77	1	16.59	30
2	30.55	19	42.76	25	51.27	31	31.29	29	33.76	1	16.29	32
3	30.74	21	42.51	27	51.58	30	31.00	30	33.75	1	15.97	32
4	30.95	21	42.24	27	51.88	33	30.70	31	33.74	1	15.65	33
5	31.16		41.97		52.21		30.39		33.73		15.32	
O. C.	$+0^s.36\cos\varphi$				$+1^s.22\cos\varphi$				$+0^s.16\cos\varphi$			
U. C.	$-0\ .36\cos\varphi$				$-1\ .22\cos\varphi$				$-0\ .16\cos\varphi$			

Obere Culmination.

1902	δ Ursae minoris. $4^m.3$.				λ Ursae minoris. $6^m.4$.				76 Draconis. $6^m.0$.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	$18^h\ 3^m$		+86° 36′		$19^h\ 18^m$		+88° 59′		$20^h\ 49^m$		+82° 10′	
Febr. 5	$31^s.16$	23	41″.97	29	$52^s.21$	38	30″.39	33	$33^s.73$	1	15″.32	35
6	31.39	25	41.68	29	52.59	45	30.06	34	33.72	1	14.97	36
7	31.64	28	41.39	27	53.04	53	29.72	33	33.71	— 1	14.61	37
8	31.92	29	41.12	26	53.57	60	29.39	32	33.72	2	14.24	37
9	32.21	31	40.86	24	54.17	66	29.07	31	33.74	3	13.87	35
10	32.52	30	40.62	21	54.83	71	28.76	29	33.77	4	13.52	34
11	32.82	31	40.41	19	55.54	73	28.47	27	33.81	3	13.18	33
12	33.13	29	40.22	18	56.27	71	28.20	24	33.84	5	12.85	31
13	33.42	28	40.04	17	56.98	66	27.96	23	33.89	4	12.54	29
14	33.70	26	39.87	16	57.64	62	27.73	23	33.93	3	12.25	29
15	33.96	25	39.71	18	58.26	59	27.50	24	33.96	3	11.96	28
16	34.21	25	39.53	19	58.85	56	27.26	25	33.99	3	11.68	29
17	34.46	26	39.34	20	59.41	57	27.01	26	34.02	3	11.39	30
18	34.72	28	39.14	21	59.98	60	26.75	28	34.05	3	11.09	33
19	35.00	29	38.93	22	60.58	67	26.47	28	34.08	3	10.76	34
20	35.29	32	38.71	21	61.25	74	26.19	29	34.11	5	10.42	34
21	35.61	34	38.50	20	61.99	83	25.90	28	34.16	5	10.08	35
22	35.95	36	38.30	18	62.82	93	25.62	27	34.21	6	9.73	34
23	36.31	38	38.12	16	63.75	98	25.35	25	34.27	7	9.39	34
24	36.69	37	37.96	13	64.73	101	25.10	23	34.34	8	9.05	31
25	37.06	36	37.83	11	65.74	101	24.87	21	34.42	9	8.74	30
26	37.42	36	37.72	10	66.75	100	24.66	19	34.51	9	8.44	28
27	37.78	34	37.62	10	67.75	95	24.47	18	34.60	9	8.16	26
28	38.12	32	37.52	9	68.70	90	24.29	18	34.69	8	7.90	25
März 1	38.44	31	37.43	10	69.60	87	24.11	18	34.77	8	7.65	26
2	38.75	32	37.33	11	70.47	85	23.93	20	34.85	7	7.39	26
3	39.07	32	37.22	13	71.32	84	23.73	20	34.92	6	7.13	28
4	39.39	33	37.09	13	72.16	88	23.53	22	34.98	7	6.85	29
5	39.72	34	36.96	13	73.04	93	23.31	22	35.05	8	6.56	31
6	40.06	37	36.83	13	73.97	100	23.09	22	35.13	8	6.25	30
7	40.43	38	36.70	11	74.97	107	22.87	21	35.21	10	5.95	31
8	40.81	39	36.59	9	76.04	113	22.66	20	35.31	10	5.64	30
9	41.20	40	36.50	7	77.17	117	22.46	18	35.41	11	5.34	28
10	41.60	39	36.43	4	78.34	119	22.28	15	35.52	12	5.06	26
11	41.99	38	36.39	3	79.53	117	22.13	13	35.64	12	4.80	24
12	42.37	37	36.36	1	80.70	113	22.00	11	35.76	11	4.56	22
13	42.74	34	36.35	1	81.83	108	21.89	10	35.87	12	4.34	20
14	43.08		36.34		82.91		21.79		35.99		4.14	
O. C.	$+0^s.36\cos\varphi$				$+1^s.21\cos\varphi$				$+0^s.16\cos\varphi$			
U. C.	$-0.36\cos\varphi$				$-1.21\cos\varphi$				$-0.16\cos\varphi$			

Obere Culmination.

1902	δ Ursae minoris. 4ᵐ.3. AR.		Decl.		λ Ursae minoris. 6ᵐ.4. AR.		Decl.		76 Draconis. 6ᵐ.0. AR.		Decl.	
	$18^h\ 3^m$		$+86°\ 36'$		$19^h\ 19^m$		$+88°\ 59'$		$20^h\ 49^m$		$+82°\ 9'$	
März 14	$43^s.08$	33	$36''.34$	1	$22^s.91$	102	$21''.79$	10	$35^s.99$	11	$64''.14$	19
15	43.41	33	36.33	1	23.93	98	21.69	12	36.10	10	63.95	19
16	43.74	32	36.32	3	24.91	97	21.57	12	36.20	9	63.76	20
17	44.06	32	36.29	4	25.88	98	21.45	13	36.29	10	63.56	21
18	44.38	35	36.25	4	26.86	102	21.32	13	36.39	10	63.35	24
19	44.73	36	36.21	5	27.88	108	21.19	15	36.49	11	63.11	24
20	45.09	39	36.16	4	28.96	115	21.04	14	36.60	11	62.87	25
21	45.48	39	36.12	2	30.11	123	20.90	13	36.71	13	62.62	25
22	45.87	41	36.10	0	31.34	129	20.77	11	36.84	14	62.37	22
23	46.28	41	36.10	3	32.63	133	20.66	9	36.98	15	62.15	21
24	46.69	40	36.13	5	33.96	133	20.57	7	37.13	15	61.94	19
25	47.09	39	36.18	7	35.29	132	20.50	5	37.28	15	61.75	17
26	47.48	37	36.25	8	36.61	126	20.45	3	37.43	15	61.58	15
27	47.85	36	36.33	8	37.87	120	20.42	3	37.58	14	61.43	14
28	48.21	34	36.41	8	39.07	114	20.39	2	37.72	14	61.29	13
29	48.55	32	36.49	7	40.21	110	20.37	3	37.86	13	61.16	14
30	48.87	33	36.56	5	41.31	108	20.34	4	37.99	12	61.02	15
31	49.20	33	36.61	4	42.39	109	20.30	6	38.11	13	60.87	15
April 1	49.53	34	36.65	4	43.48	113	20.24	6	38.24	12	60.72	17
2	49.87	36	36.69	4	44.61	118	20.18	6	38.36	13	60.55	18
3	50.23	37	36.73	6	45.79	123	20.12	6	38.49	15	60.37	17
4	50.60	39	36.79	7	47.02	129	20.06	4	38.64	15	60.20	16
5	50.99	38	36.86	10	48.31	133	20.02	1	38.79	16	60.04	15
6	51.37	38	36.96	12	49.64	135	20.01	— 1	38.95	17	59.89	12
7	51.75	36	37.08	14	50.99	132	20.02	2	39.12	17	59.77	10
8	52.11	35	37.22	15	52.31	128	20.04	4	39.29	16	59.67	7
9	52.46	33	37.37	16	53.59	121	20.08	6	39.45	16	59.60	6
10	52.79	31	37.53	16	54.80	115	20.14	7	39.61	16	59.54	4
11	53.10	29	37.69	15	55.95	109	20.21	6	39.77	14	59.50	5
12	53.39	28	37.84	15	57.04	105	20.27	5	39.91	15	59.45	5
13	53.67	29	37.99	13	58.09	104	20.32	4	40.06	14	59.40	6
14	53.96	29	38.12	12	59.13	106	20.36	3	40.20	13	59.34	8
15	54.25	30	38.24	12	60.19	110	20.39	2	40.33	14	59.26	8
16	54.55	32	38.36	12	61.29	115	20.41	3	40.47	15	59.18	9
17	54.87	34	38.48	14	62.44	122	20.44	3	40.62	16	59.09	8
18	55.21	35	38.62	15	63.66	127	20.47	4	40.78	17	59.01	7
19	55.56	35	38.77	18	64.93	131	20.51	7	40.95	17	58.94	5
20	55.91		38.95		66.24		20.58		41.12		58.89	
O. C.	$+0^s.36\cos\varphi$				$+1^s.21\cos\varphi$				$+0^s.16\cos\varphi$			
U. C.	$-0.36\cos\varphi$				$-1.21\cos\varphi$				$-0.16\cos\varphi$			

Obere Culmination.

1902	δ Ursae minoris. 4ᵐ.3.				λ Ursae minoris. 6ᵐ.4.				76 Draconis. 6ᵐ.0.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	18ʰ 3ᵐ		+86° 36′		19ʰ 20ᵐ		+88° 59′		20ʰ 49ᵐ		+82° 9′	
April 20	55.91ˢ	34	38.95″	20	6.24ˢ	131	20.58″	9	41.12ˢ	18	58.89″	3
21	56.25	33	39.15	23	7.55	129	20.67	12	41.30	18	58.86	2
22	56.58	30	39.38	23	8.84	124	20.79	13	41.48	18	58.84	0
23	56.88	29	39.61	24	10.08	117	20.92	14	41.66	16	58.84	2
24	57.17	27	39.85	23	11.25	110	21.06	14	41.82	17	58.86	4
25	57.44	25	40.08	22	12.35	104	21.20	13	41.99	16	58.90	3
26	57.69	24	40.30	21	13.39	100	21.33	13	42.15	15	58.93	3
27	57.93	24	40.51	20	14.39	98	21.46	12	42.30	14	58.96	1
28	58.17	25	40.71	19	15.37	100	21.58	11	42.44	15	58.97	1
29	58.42	26	40.90	18	16.37	104	21.69	9	42.59	15	58.98	0
30	58.68	27	41.08	19	17.41	108	21.78	10	42.74	15	58.98	1
Mai 1	58.95	27	41.27	20	18.49	112	21.88	11	42.89	16	58.97	0
2	59.22	29	41.47	23	19.61	115	21.99	13	43.05	17	58.97	2
3	59.51	28	41.70	25	20.76	117	22.12	15	43.22	18	58.99	3
4	59.79	27	41.95	27	21.93	115	22.27	18	43.40	17	59.02	6
5	60.06	24	42.22	29	23.08	111	22.45	20	43.57	18	59.08	9
6	60.30	23	42.51	29	24.19	104	22.65	21	43.75	17	59.17	11
7	60.53	20	42.80	29	25.23	97	22.86	22	43.92	16	59.28	12
8	60.73	18	43.09	29	26.20	89	23.08	21	44.08	16	59.40	12
9	60.91	16	43.38	27	27.09	83	23.29	21	44.24	14	59.52	12
10	61.07	16	43.65	26	27.92	79	23.50	20	44.38	15	59.64	11
11	61.23	16	43.91	24	28.71	79	23.70	19	44.53	13	59.75	10
12	61.39	16	44.15	24	29.50	81	23.89	17	44.66	14	59.85	10
13	61.55	19	44.39	24	30.31	85	24.06	17	44.80	13	59.95	8
14	61.74	20	44.63	24	31.16	91	24.23	17	44.93	15	60.03	8
15	61.94	21	44.87	26	32.07	96	24.40	18	45.08	15	60.11	9
16	62.15	22	45.13	27	33.03	100	24.58	20	45.23	16	60.20	10
17	62.37	20	45.40	30	34.03	100	24.78	22	45.39	17	60.30	12
18	62.57	19	45.70	32	35.03	98	25.00	25	45.56	17	60.42	14
19	62.76	18	46.02	34	36.01	93	25.25	26	45.73	17	60.56	17
20	62.94	15	46.36	34	36.94	86	25.51	27	45.90	16	60.73	18
21	63.09	12	46.70	33	37.80	78	25.78	28	46.06	15	60.91	19
22	63.21	11	47.03	32	38.58	70	26.06	28	46.21	15	61.10	19
23	63.32	9	47.35	30	39.28	65	26.34	26	46.36	13	61.29	19
24	63.41	9	47.65	29	39.93	61	26.60	25	46.49	12	61.48	17
25	63.50	9	47.94	28	40.54	61	26.85	23	46.61	12	61.65	17
26	63.59	10	48.22	28	41.15	63	27.08	22	46.73	13	61.82	17
27	63.69		48.50		41.78		27.30		46.86		61.99	
O. C.	+ 0ˢ.36 cos φ				+ 1ˢ.21 cos φ				+ 0ˢ.16 cos φ			
U. C.	— 0 .36 cos φ				— 1 .21 cos φ				— 0 .16 cos φ			

Obere Culmination.

1902	δ Ursae minoris. 4ᵐ.3. AR.		δ Ursae minoris. Decl.		λ Ursae minoris. 6ᵐ.4. AR.		λ Ursae minoris. Decl.		76 Draconis. 6ᵐ.0. AR.		76 Draconis. Decl.	
	18ʰ 4ᵐ		+86° 36′		19ʰ 20ᵐ		+88° 59′		20ʰ 49ᵐ		+82° 10′	
Mai 27	3.69	11	48.50	27	41.78	66	27.30	22	46.86	13	1.99	15
28	3.80	12	48.77	28	42.44	71	27.52	24	46.99	14	2.14	16
29	3.92	13	49.05	29	43.15	74	27.76	24	47.13	15	2.30	18
30	4.05	12	49.34	31	43.89	76	28.00	26	47.28	14	2.48	19
31	4.17	12	49.65	34	44.65	74	28.26	28	47.42	14	2.67	20
Juni 1	4.29	9	49.99	35	45.39	70	28.54	31	47.56	15	2.87	22
2	4.38	7	50.34	36	46.09	63	28.85	31	47.71	15	3.09	24
3	4.45	5	50.70	36	46.72	54	29.16	32	47.86	13	3.33	26
4	4.50	2	51.06	35	47.26	46	29.48	33	47.99	12	3.59	27
5	4.52	— 1	51.41	34	47.72	40	29.81	32	48.11	11	3.86	27
6	4.51	1	51.75	31	48.12	35	30.13	30	48.22	10	4.13	27
7	4.50	1	52.06	31	48.47	31	30.43	29	48.32	10	4.40	26
8	4.49	0	52.37	29	48.78	32	30.72	27	48.42	10	4.66	24
9	4.49	1	52.66	28	49.10	36	30.99	27	48.52	11	4.90	23
10	4.50	2	52.94	30	49.46	40	31.26	26	48.63	10	5.13	22
11	4.52	4	53.24	30	49.86	45	31.52	27	48.73	11	5.35	21
12	4.56	4	53.54	31	50.31	48	31.79	28	48.84	12	5.56	22
13	4.60	3	53.85	33	50.79	50	32.07	30	48.96	13	5.78	24
14	4.63	3	54.18	35	51.29	48	32.37	32	49.09	13	6.02	25
15	4.66	1	54.53	35	51.77	44	32.69	34	49.22	11	6.27	29
16	4.67	— 1	54.88	37	52.21	37	33.03	35	49.33	12	6.56	31
17	4.66	4	55.25	37	52.58	30	33.38	36	49.45	11	6.87	32
18	4.62	6	55.62	36	52.88	22	33.74	34	49.56	10	7.19	32
19	4.56	9	55.98	33	53.10	14	34.08	34	49.66	9	7.51	32
20	4.47	8	56.31	32	53.24	9	34.42	32	49.75	8	7.83	30
21	4.39	9	56.63	30	53.33	7	34.74	31	49.83	7	8.13	29
22	4.30	7	56.93	29	53.40	8	35.05	30	49.90	7	8.42	28
23	4.23	7	57.22	28	53.48	11	35.35	28	49.97	8	8.70	27
24	4.16	6	57.50	29	53.59	15	35.63	28	50.05	8	8.97	27
25	4.10	5	57.79	29	53.74	18	35.91	30	50.13	8	9.24	27
26	4.05	5	58.08	31	53.92	20	36.21	31	50.21	9	9.51	28
27	4.00	6	58.39	33	54.12	19	36.52	33	50.30	10	9.79	30
28	3.94	7	58.72	35	54.31	17	36.85	34	50.40	9	10.09	32
29	3.87	10	59.07	35	54.48	10	37.19	36	50.49	8	10.41	34
30	3.77	12	59.42	36	54.58	2	37.55	37	50.57	8	10.75	35
Juli 1	3.65	15	59.78	36	54.60	— 6	37.92	38	50.65	7	11.10	37
2	3.50	16	60.14	33	54.54	14	38.30	37	50.72	6	11.47	37
3	3.34		60.47		54.40		38.67		50.78		11.84	
O. C.	+ 0ˢ.36 cos φ				+ 1ˢ.22 cos φ				+ 0ˢ.16 cos φ			
U. C.	— 0 .36 cos φ				— 1 .22 cos φ				— 0 .16 cos φ			

Obere Culmination.

1902	δ Ursae minoris. $4^m.3$.				λ Ursae minoris. $6^m.4$.				76 Draconis. $6^m.0$.			
	AR.		Decl.		AR.		Decl.		AR.		Decl.	
	$18^h\ 3^m$		$+86°\ 37'$		$19^h\ 20^m$		$+88°\ 59'$		$20^h\ 49^m$		$+82°\ 10'$	
Juli 3	$63^s.34$	17	$0''.47$	32	$54^s.40$	21	$38''.67$	35	$50^s.78$	4	$11''.84$	36
4	63.17	19	0.79	29	54.19	24	39.02	33	50.82	4	12.20	34
5	62.98	19	1.08	29	53.95	25	39.35	31	50.86	4	12.54	34
6	62.79	17	1.37	27	53.70	23	39.66	30	50.90	4	12.88	31
7	62.62	15	1.64	27	53.47	19	39.96	29	50.94	4	13.19	30
8	62.47	14	1.91	27	53.28	14	40.25	30	50.98	5	13.49	30
9	62.33	14	2.18	28	53.14	10	40.55	31	51.03	6	13.79	31
10	62.19	13	2.46	29	53.04	8	40.86	31	51.09	5	14.10	31
11	62.06	14	2.75	32	52.96	8	41.17	33	51.14	6	14.41	33
12	61.92	15	3.07	32	52.88	11	41.50	35	51.20	6	14.74	35
13	61.77	17	3.39	34	52.77	17	41.85	36	51.26	5	15.09	37
14	61.60	20	3.73	33	52.60	24	42.21	37	51.31	4	15.46	38
15	61.40	22	4.06	32	52.36	33	42.58	37	51.35	4	15.84	38
16	61.18	23	4.38	30	52.03	42	42.95	35	51.39	2	16.22	38
17	60.95	25	4.68	29	51.61	46	43.30	34	51.41	2	16.60	37
18	60.70	25	4.97	26	51.15	49	43.64	32	51.43	1	16.97	36
19	60.45	24	5.23	25	50.66	49	43.96	30	51.44	0	17.33	34
20	60.21	23	5.48	24	50.17	48	44.26	29	51.44	1	17.67	33
21	59.98	23	5.72	23	49.69	44	44.55	29	51.45	1	18.00	32
22	59.75	21	5.95	24	49.25	39	44.84	29	51.46	2	18.32	31
23	59.54	21	6.19	25	48.86	37	45.13	30	51.48	2	18.63	32
24	59.33	21	6.44	27	48.49	37	45.43	31	51.50	2	18.95	34
25	59.12	22	6.71	28	48.12	38	45.74	32	51.52	2	19.29	36
26	58.90	25	6.99	29	47.74	43	46.06	35	51.54	2	19.65	38
27	58.65	27	7.28	30	47.31	50	46.41	36	51.56	1	20.03	39
28	58.38	28	7.58	29	46.81	59	46.77	36	51.57	0	20.42	39
29	58.10	31	7.87	27	46.22	67	47.13	35	51.57	1	20.81	40
30	57.79	32	8.14	26	45.55	74	47.48	33	51.56	2	21.21	39
31	57.47	34	8.40	24	44.81	79	47.81	32	51.54	2	21.60	39
Aug. 1	57.13	33	8.64	22	44.02	80	48.13	30	51.52	3	21.99	36
2	56.80	32	8.86	21	43.22	79	48.43	28	51.49	4	22.35	35
3	56.48	31	9.07	19	42.43	75	48.71	27	51.45	3	22.70	33
4	56.17	28	9.26	19	41.68	70	48.98	26	51.42	3	23.03	33
5	55.89	28	9.45	20	40.98	65	49.24	27	51.39	2	23.36	32
6	55.61	27	9.65	21	40.33	62	49.51	28	51.37	2	23.68	33
7	55.34	27	9.86	22	39.71	61	49.79	29	51.35	1	24.01	34
8	55.07	28	10.08	24	39.10	63	50.08	31	51.34	1	24.35	36
9	54.79		10.32		38.47		50.39		51.33		24.71	
O. C.	$+0^s.36\cos\varphi$				$+1^s.22\cos\varphi$				$+0^s.16\cos\varphi$			
U. C.	$-0.36\cos\varphi$				$-1.22\cos\varphi$				$-0.16\cos\varphi$			

Obere Culmination.

1902	δ Ursae minoris. 4m.3. AR.		δ Ursae minoris. Decl.		λ Ursae minoris. 6m.4. AR.		λ Ursae minoris. Decl.		76 Draconis. 6m.0. AR.		76 Draconis. Decl.	
	18h 3m		+86° 37′		19h 19m		+88° 59′		20h 49m		+82° 10′	
	s		″		s		″		s		″	
Aug. 9	54.79	31	10.32	25	98.47	67	50.39	32	51.33	1	24.71	37
10	54.48	33	10.57	25	97.80	74	50.71	33	51.32	3	25.08	39
11	54.15	34	10.82	24	97.06	82	51.04	33	51.29	3	25.47	39
12	53.81	35	11.06	22	96.24	90	51.37	31	51.26	4	25.86	39
13	53.46	37	11.28	21	95.34	96	51.68	29	51.22	5	26.25	38
14	53.09	38	11.49	18	94.38	99	51.97	28	51.17	7	26.63	36
15	52.71	38	11.67	16	93.39	101	52.25	26	51.10	6	26.99	35
16	52.33	36	11.83	14	92.38	99	52.51	24	51.04	7	27.34	33
17	51.97	34	11.97	14	91.39	94	52.75	23	50.97	6	27.67	31
18	51.63	34	12.11	15	90.45	91	52.98	23	50.91	6	27.98	31
19	51.29	32	12.26	15	89.54	87	53.21	24	50.85	6	28.29	31
20	50.97	32	12.41	16	88.67	85	53.45	25	50.79	5	28.60	32
21	50.65	33	12.57	18	87.82	85	53.70	26	50.74	4	28.92	33
22	50.32	35	12.75	19	86.97	88	53.96	27	50.70	5	29.25	35
23	49.97	37	12.94	18	86.09	95	54.23	29	50.65	6	29.60	36
24	49.60	39	13.12	19	85.14	102	54.52	29	50.59	6	29.96	38
25	49.21	41	13.31	17	84.12	110	54.81	29	50.53	7	30.34	37
26	48.80	42	13.48	16	83.02	117	55.10	27	50.46	8	30.71	38
27	48.38	43	13.64	14	81.85	122	55.37	26	50.38	9	31.09	37
28	47.95	44	13.78	12	80.63	125	55.63	24	50.29	10	31.46	34
29	47.51	42	13.90	10	79.38	124	55.87	21	50.19	10	31.80	33
30	47.09	40	14.00	9	78.14	120	56.08	19	50.09	10	32.13	31
31	46.69	39	14.09	8	76.94	116	56.27	19	49.99	10	32.44	29
Sept. 1	46.30	38	14.17	8	75.78	111	56.46	19	49.89	9	32.73	29
2	45.92	36	14.25	9	74.67	106	56.65	19	49.80	8	33.02	28
3	45.56	36	14.34	11	73.61	103	56.84	20	49.72	8	33.30	30
4	45.20	36	14.45	12	72.58	102	57.04	22	49.64	7	33.60	31
5	44.84	37	14.57	13	71.56	106	57.26	23	49.57	8	33.91	33
6	44.47	40	14.70	13	70.50	111	57.49	23	49.49	8	34.24	34
7	44.07	41	14.83	13	69.39	118	57.72	25	49.41	9	34.58	35
8	43.66	43	14.96	11	68.21	125	57.97	24	49.32	11	34.93	34
9	43.23	45	15.07	9	66.96	131	58.21	22	49.21	11	35.27	33
10	42.78	45	15.16	7	65.65	136	58.43	19	49.10	12	35.60	32
11	42.33	44	15.23	5	64.29	139	58.62	17	48.98	13	35.92	29
12	41.89	43	15.28	3	62.90	136	58.79	15	48.85	13	36.21	28
13	41.46	42	15.31	2	61.54	131	58.94	13	48.72	13	36.49	26
14	41.04	41	15.33	1	60.23	127	59.07	13	48.59	12	36.75	25
15	40.63		15.34		58.96		59.20		48.47		37.00	
O. C.	+ 0s.36 cos φ				+ 1s.22 cos φ				+ 0s.16 cos φ			
U. C.	— 0 .36 cos φ				— 1 .22 cos φ				— 0 .16 cos φ			

Obere Culmination.

1902	δ Ursae minoris. 4ᵐ.3. AR.		Decl.		λ Ursae minoris. 6ᵐ.4. AR.		Decl.		76 Draconis. 6ᵐ.0. AR.		Decl.	
	18ʰ 3ᵐ		+86° 37′		19ʰ 19ᵐ		+88° 59′		20ʰ 49ᵐ		+82° 10′	
Sept. 15	40.63ˢ	39	15.34″	2	58.96ˢ	123	59.20″	13	48.47ˢ	11	37.00″	24
16	40.24	38	15.36	3	57.73	120	59.33	15	48.36	11	37.24	25
17	39.86	38	15.39	5	56.53	118	59.48	15	48.25	10	37.49	25
18	39.48	39	15.44	6	55.35	119	59.63	17	48.15	11	37.74	27
19	39.09	40	15.50	7	54.16	124	59.80	18	48.04	11	38.01	29
20	38.69	43	15.57	6	52.92	130	59.98	19	47.93	12	38.30	30
21	38.26	45	15.63	5	51.62	137	60.17	18	47.81	13	38.60	31
22	37.81	46	15.68	4	50.25	144	60.35	17	47.68	13	38.91	30
23	37.35	47	15.72	2	48.81	150	60.52	15	47.55	14	39.21	29
24	36.88	48	15.74	— 1	47.31	153	60.67	14	47.41	15	39.50	27
25	36.40	46	15.73	3	45.78	152	60.81	11	47.26	16	39.77	25
26	35.94	45	15.70	3	44.26	150	60.92	9	47.10	15	40.02	23
27	35.49	43	15.67	5	42.76	144	61.01	7	46.95	15	40.25	22
28	35.06	41	15.62	6	41.32	138	61.08	7	46.80	15	40.47	20
29	34.65	39	15.56	4	39.94	132	61.15	8	46.65	14	40.67	19
30	34.26	38	15.52	4	38.62	127	61.23	8	46.51	12	40.86	20
Oct. 1	33.88	38	15.48	2	37.35	127	61.31	9	46.39	13	41.06	21
2	33.50	40	15.46	1	36.08	127	61.40	11	46.26	13	41.27	22
3	33.10	40	15.45	0	34.81	130	61.51	12	46.13	13	41.49	23
4	32.70	43	15.45	1	33.51	137	61.63	12	46.00	14	41.72	25
5	32.27	44	15.44	2	32.14	144	61.75	10	45.86	14	41.97	25
6	31.83	45	15.42	3	30.70	150	61.85	10	45.72	16	42.22	23
7	31.38	46	15.39	5	29.20	153	61.95	8	45.56	16	42.45	22
8	30.92	45	15.34	8	27.67	154	62.03	6	45.40	16	42.67	20
9	30.47	44	15.26	10	26.13	154	62.09	3	45.24	18	42.87	18
10	30.03	42	15.16	11	24.59	151	62.12	1	45.06	16	43.05	16
11	29.61	41	15.05	12	23.08	145	62.13	1	44.90	17	43.21	15
12	29.20	38	14.93	12	21.63	138	62.14	0	44.73	16	43.36	14
13	28.82	37	14.81	11	20.25	134	62.14	1	44.57	15	43.50	13
14	28.45	37	14.70	10	18.91	131	62.15	2	44.42	15	43.63	14
15	28.08	38	14.60	9	17.60	130	62.17	3	44.27	14	43.77	15
16	27.70	38	14.51	7	16.30	133	62.20	4	44.13	14	43.92	16
17	27.32	40	14.44	7	14.97	138	62.24	5	43.99	15	44.08	18
18	26.92	42	14.37	8	13.59	145	62.29	5	43.84	16	44.26	18
19	26.50	43	14.29	9	12.14	151	62.34	5	43.68	16	44.44	18
20	26.07	44	14.20	10	10.63	156	62.39	2	43.52	17	44.62	18
21	25.63	45	14.10	13	9.07	158	62.41	1	43.35	18	44.80	16
22	25.18		13.97		7.49		62.42		43.17		44.96	
O. C.	+ 0ˢ.36 cos φ				+ 1ˢ.23 cos φ				+ 0ˢ.16 cos φ			
U. C.	— 0 .36 cos φ				— 1 .23 cos φ				— 0 .16 cos φ			

Obere Culmination.

1902	δ Ursae minoris. 4ᵐ.3. AR.		δ Ursae minoris. Decl.		λ Ursae minoris. 6ᵐ.4. AR.		λ Ursae minoris. Decl.		76 Draconis. 6ᵐ.0. AR.		76 Draconis. Decl.	
	18ʰ 3ᵐ		+86° 37′		19ʰ 18ᵐ		+88° 59′		20ʰ 49ᵐ		+82° 10′	
Oct. 22	25.18ˢ	43	13.97″	16	67.49ˢ	159	62.42″	2	43.17ˢ	19	44.96″	13
23	24.75	42	13.81	18	65.90	157	62.40	4	42.98	18	45.09	11
24	24.33	40	13.63	18	64.33	151	62.36	6	42.80	19	45.20	10
25	23.93	38	13.45	18	62.82	145	62.30	6	42.61	18	45.30	8
26	23.55	35	13.27	19	61.37	137	62.24	7	42.43	17	45.38	7
27	23.20	34	13.08	19	60.00	132	62.17	6	42.26	16	45.45	7
28	22.86	34	12.89	16	58.68	127	62.11	5	42.10	15	45.52	7
29	22.52	33	12.73	14	57.41	126	62.06	4	41.95	16	45.59	8
30	22.19	35	12.59	14	56.15	128	62.02	3	41.79	15	45.67	10
31	21.84	36	12.45	14	54.87	132	61.99	3	41.64	15	45.77	10
Nov. 1	21.48	37	12.31	14	53.55	138	61.96	2	41.49	16	45.87	10
2	21.11	38	12.17	16	52.17	144	61.94	4	41.33	17	45.97	9
3	20.73	39	12.01	18	50.73	147	61.90	5	41.16	18	46.06	8
4	20.34	38	11.83	21	49.26	149	61.85	7	40.98	19	46.14	7
5	19.96	37	11.62	22	47.77	147	61.78	11	40.79	18	46.21	5
6	19.59	35	11.40	24	46.30	144	61.67	12	40.61	19	46.26	3
7	19.24	33	11.16	25	44.86	139	61.55	14	40.42	18	46.29	1
8	18.91	31	10.91	24	43.47	133	61.41	14	40.24	17	46.30	— 1
9	18.60	30	10.67	25	42.14	125	61.27	13	40.07	17	46.29	3
10	18.30	29	10.42	23	40.89	120	61.14	13	39.90	16	46.26	2
11	18.01	28	10.19	21	39.69	118	61.01	12	39.74	15	46.24	0
12	17.73	29	9.98	20	38.51	118	60.89	11	39.59	15	46.24	1
13	17.44	30	9.78	20	37.33	121	60.78	10	39.44	16	46.25	3
14	17.14	32	9.58	21	36.12	126	60.68	9	39.28	16	46.28	4
15	16.82	32	9.37	21	34.86	132	60.59	10	39.12	17	46.32	3
16	16.50	34	9.16	22	33.54	137	60.49	10	38.95	17	46.35	2
17	16.16	34	8.94	24	32.17	140	60.39	13	38.78	18	46.37	1
18	15.82	33	8.70	27	30.77	140	60.26	15	38.60	19	46.38	— 1
19	15.49	32	8.43	28	29.37	138	60.11	18	38.41	20	46.37	4
20	15.17	29	8.15	30	27.99	133	59.93	19	38.21	19	46.33	6
21	14.88	27	7.85	30	26.66	126	59.74	21	38.02	18	46.27	8
22	14.61	25	7.55	30	25.40	117	59.53	20	37.84	16	46.19	9
23	14.36	23	7.25	29	24.23	109	59.33	21	37.68	15	46.10	9
24	14.13	22	6.96	28	23.14	103	59.12	20	37.53	15	46.01	9
25	13.91	21	6.68	26	22.11	101	58.92	18	37.38	14	45.92	8
26	13.70	21	6.42	25	21.10	101	58.74	17	37.24	14	45.84	6
27	13.49	22	6.17	25	20.09	103	58.57	16	37.10	15	45.78	6
28	13.27		5.92		19.06		58.41		36.95		45.72	
O. C.	+ 0ˢ.36 cos φ				+ 1ˢ.23 cos φ				+ 0ˢ.16 cos φ			
U. C.	— 0 .36 cos φ				— 1 .23 cos φ				— 0 .16 cos φ			

Obere Culmination.

1902	δ Ursae minoris. 4m.3. AR.		δ Ursae minoris. Decl.		λ Ursae minoris. 6m.4. AR.		λ Ursae minoris. Decl.		76 Draconis. 6m.0. AR.		76 Draconis. Decl.	
	18h 3m		+86° 36′		19h 17m		+88° 59′		20h 49m		+82° 10′	
Nov. 28	13.27	23	65.92	25	79.06	107	58.41	16	36.95	15	45.72	6
29	13.04	24	65.67	27	77.99	111	58.25	17	36.80	15	45.66	6
30	12.80	25	65.40	28	76.88	115	58.08	18	36.65	17	45.60	7
Dec. 1	12.55	25	65.12	29	75.73	117	57.90	21	36.48	17	45.53	9
2	12.30	24	64.83	32	74.56	115	57.69	23	36.31	18	45.44	11
3	12.06	22	64.51	33	73.41	112	57.46	25	36.13	16	45.33	13
4	11.84	19	64.18	34	72.29	107	57.21	26	35.97	16	45.20	14
5	11.65	17	63.84	35	71.22	99	56.95	27	35.81	16	45.06	16
6	11.48	15	63.49	34	70.23	91	56.68	27	35.65	15	44.90	17
7	11.33	14	63.15	33	69.32	84	56.41	26	35.50	14	44.73	18
8	11.19	12	62.82	31	68.48	80	56.15	26	35.36	13	44.55	16
9	11.07	13	62.51	30	67.68	79	55.89	24	35.23	13	44.39	15
10	10.94	13	62.21	29	66.89	79	55.65	22	35.10	12	44.24	14
11	10.81	15	61.92	28	66.10	82	55.43	21	34.98	14	44.10	13
12	10.66	16	61.64	28	65.28	87	55.22	22	34.84	14	43.97	12
13	10.50	17	61.36	30	64.41	92	55.00	23	34.70	14	43.85	13
14	10.33	17	61.06	31	63.49	95	54.77	24	34.56	15	43.72	14
15	10.16	16	60.75	34	62.54	96	54.53	26	34.41	16	43.58	16
16	10.00	16	60.41	35	61.58	93	54.27	28	34.25	15	43.42	18
17	9.84	13	60.06	37	60.65	88	53.99	31	34.10	15	43.24	20
18	9.71	11	59.69	36	59.77	81	53.68	31	33.95	14	43.04	23
19	9.60	8	59.33	38	58.96	72	53.37	32	33.81	14	42.81	23
20	9.52	5	58.95	36	58.24	63	53.05	32	33.67	13	42.58	25
21	9.47	4	58.59	35	57.61	56	52.73	31	33.54	11	42.33	24
22	9.43	3	58.24	32	57.05	51	52.42	30	33.43	10	42.09	23
23	{ 9.40	3	{ 57.92	31	56.54	48	52.12	28	33.33	10	41.86	22
	{ 9.37	4	{ 57.61	31								
24	9.33	4	57.30	30	56.06	49	51.84	27	33.23	10	41.64	21
25	9.29	5	57.00	30	55.57	52	51.57	26	33.13	10	41.43	20
26	9.24	6	56.70	32	55.05	55	51.31	26	33.03	11	41.23	20
27	9.18	7	56.38	33	54.50	59	51.05	27	32.92	11	41.03	20
28	9.11	5	56.05	35	53.91	61	50.78	29	32.81	12	40.83	22
29	9.06	3	55.70	37	53.30	61	50.49	31	32.69	12	40.61	25
30	9.03	1	55.33	38	52.69	57	50.18	33	32.57	12	40.36	27
31	9.02	—2	54.95	38	52.12	52	49.85	35	32.45	11	40.09	27
32	9.04		54.57		51.60		49.50		32.34		39.82	
O. C.	+ 0s.36 cos φ				+ 1s.22 cos φ				+ 0s.16 cos φ			
U. C.	— 0 .36 cos φ				— 1 .22 cos φ				— 0 .16 cos φ			

1902	α Andromed. $2^m.0$ AR.		Decl. +		β Cassiopej. $2^m.1$ AR.		Decl. +		γ Pegasi. $2^m.6$ AR.		Decl. +		ι Ceti. $3^m.3$ AR.		Decl. −	
	$0^h\ 3^m$		28° 32′		$0^h\ 3^m$		58° 36′		$0^h\ 8^m$		14° 38′		$0^h\ 14^m$		9° 21′	
Jan. 0	19.98	14	71.1	10	57.83	31	54.1	8	11.97	12	27.6	9	26.55	12	62.7	6
10	19.84	14	70.1	12	57.52	30	53.3	13	11.85	11	26.7	10	26.43	11	63.3	5
20	19.70	13	68.9	15	57.22	28	52.0	17	11.74	11	25.7	11	26.32	10	63.8	3
30	19.57	11	67.4	16	56.94	24	50.3	22	11.63	10	24.6	11	26.22	9	64.1	0
Febr. 9	19.46	8	65.8	16	56.70	19	48.1	25	11.53	7	23.5	10	26.13	7	64.1	0
19	19.38	5	64.2	17	56.51	14	45.6	26	11.46	4	22.5	10	26.06	5	64.1	3
März 1	19.33	1	62.5	17	56.37	6	43.0	28	11.42	1	21.5	9	26.01	2	63.8	5
11	19.32	— 2	60.8	15	56.31	— 1	40.2	28	11.41	— 2	20.6	7	25.99	— 1	63.3	8
21	19.34	8	59.3	13	56.32	10	37.4	28	11.43	7	19.9	4	26.00	6	62.5	11
31	22 19.42	12	58.0	9	22 56.42	18	34.6	23	23 11.50	10	19.5	2	25 26.06	10	61.4	13
April 10	19.54	17	57.1	6	56.60	25	32.3	20	11.60	15	19.3	— 1	26.16	14	60.1	15
20	19.71	21	56.5	3	56.85	32	30.3	17	11.75	19	19.4	5	26.30	17	58.6	17
30	19.92	25	56.2	— 2	57.17	38	28.6	11	11.94	23	19.9	8	26.47	21	56.9	18
Mai 10	20.17	28	56.4	5	57.55	44	27.5	7	12.17	26	20.7	11	26.68	25	55.1	20
20	20.45	31	56.9	9	57.99	47	26.8	1	12.43	28	21.8	13	26.93	27	53.1	21
30	20.76	33	57.8	13	58.46	50	26.7	— 5	12.71	30	23.1	16	27.20	29	51.0	21
Juni 9	21.09	33	59.1	16	58.96	50	27.2	9	13.01	31	24.7	18	27.49	30	48.9	20
19	21.42	34	60.7	19	59.46	50	28.1	15	13.32	32	26.5	20	27.79	31	46.9	20
29	21.76	33	62.6	21	59.96	49	29.6	19	13.64	31	28.5	21	28.10	31	44.9	18
Juli 9	22.09	31	64.7	23	60.45	46	31.5	22	13.95	30	30.6	21	28.41	29	43.1	17
19	22.40	29	67.0	24	60.91	42	33.7	26	14.25	27	32.7	21	28.70	27	41.4	14
29	22.69	25	69.4	25	61.33	37	36.3	29	14.52	24	34.8	21	28.97	25	40.0	12
Aug. 8	22.94	22	71.9	24	61.70	32	39.2	31	14.76	21	36.9	19	29.22	22	38.8	9
18	23.16	18	74.3	24	62.02	26	42.3	33	14.97	18	38.8	18	29.44	18	37.9	6
28	23.34	14	76.7	23	62.28	20	45.6	33	15.15	13	40.6	16	29.62	14	37.3	3
Sept. 7	23.48	10	79.0	22	62.48	13	48.9	34	15.28	10	42.2	14	29.76	11	37.0	1
17	23.58	6	81.2	20	62.61	7	52.3	33	15.38	6	43.6	13	29.87	6	36.9	— 2
27	23.64	2	83.2	18	62.68	1	55.6	32	15.44	3	44.9	10	29.93	3	37.1	5
Oct. 7	23.66	— 1	85.0	15	62.69	— 5	58.8	29	15.47	0	45.9	7	29.96	0	37.6	6
17	23.65	5	86.5	13	62.64	10	61.7	27	15.47	4	46.6	6	29.96	3	38.2	8
27	23.60	7	87.8	10	62.54	16	64.4	24	15.43	6	47.2	3	29.93	6	39.0	9
Nov. 6	23.53	10	88.8	8	62.38	21	66.8	21	15.37	8	47.5	1	29.87	8	39.9	10
16	23.43	11	89.6	4	62.17	24	68.9	15	15.29	9	47.6	— 1	29.79	10	40.9	10
26	23.32	13	90.0	1	61.93	27	70.4	11	15.20	11	47.5	3	29.69	10	41.9	9
Dec. 6	23.19	14	90.1	— 2	61.66	30	71.5	6	15.09	12	47.2	5	29.59	12	42.8	9
16	23.05	15	89.9	6	61.36	31	72.1	0	14.97	13	46.7	7	29.47	12	43.7	8
26	22.90	15	89.3	8	61.05	32	72.1	5	14.84	12	46.0	9	29.35	12	44.5	7
36	22.75		88.5		60.73		71.6		14.72		45.1		29.23		45.2	
Mittl. Ort	19.20		58.0		56.63		33.0		11.28		19.4		26.04		62.3	
			1)				2)				3)				4)	

1902	12 Ceti. $6^m.0$. AR.		Decl. —		ζ Cassiopej. $4^m.0$. AR.		Decl. +		π Andromed. $4^m.0$. AR.		Decl. +		δ Andromed. $3^m.3$. AR.		Decl. +	
	$0^h\ 25^m$		$4°\ 29'$		$0^h\ 31^m$		$53°\ 21'$		$0^h\ 31^m$		$33°\ 10'$		$0^h\ 34^m$		$30°\ 19'$	
Jan. 0	2.85	12	54.9	7	31.88	26	46.4	5	39.68	16	61.1	7	6.18	15	42.2	7
10	2.73	11	55.6	6	31.62	26	45.9	10	39.52	16	60.4	11	6.03	15	41.5	11
20	2.62	11	56.2	4	31.36	25	44.9	15	39.36	15	59.3	13	5.88	15	40.4	13
30	2.51	10	56.6	3	31.11	23	43.4	18	39.21	14	58.0	15	5.73	13	39.1	14
Febr. 9	2.41	8	56.9	2	30.88	19	41.6	22	39.07	12	56.5	17	5.60	11	37.7	16
19	2.33	5	57.1	0	30.69	15	39.4	24	38.95	9	54.8	18	5.49	8	36.1	16
März 1	2.28	3	57.1	3	30.54	9	37.0	25	38.86	5	53.0	17	5.41	5	34.5	17
11	2.25	0	56.8	5	30.45	3	34.5	25	38.81	0	51.3	17	5.36	1	32.8	15
21	2.25	5	56.3	8	30.42	— 5	32.0	27	38.81	4	49.6	16	5.35	— 4	31.3	14
31	[27] 2.30	9	55.5	9	[29] 30.47	11	29.3	22	[29] 38.85	9	48.0	13	[30] 5.39	9	29.9	11
April 10	2.39	13	54.6	12	30.58	18	27.1	19	38.94	15	46.7	10	5.48	14	28.8	8
20	2.52	16	53.4	15	30.76	26	25.2	16	39.09	19	45.7	6	5.62	18	28.0	5
30	2.68	20	51.9	16	31.02	31	23.6	11	39.28	24	45.1	2	5.80	23	27.5	2
Mai 10	2.88	24	50.3	18	31.33	36	22.5	7	39.52	27	44.9	— 2	6.03	27	27.3	— 3
20	3.12	27	48.5	19	31.69	40	21.8	2	39.79	31	45.1	5	6.30	30	27.6	7
30	3.39	28	46.6	20	32.09	44	21.6	— 2	40.10	33	45.6	10	6.60	32	28.3	10
Juni 9	3.67	30	44.6	21	32.53	45	21.8	8	40.43	35	46.6	13	6.92	34	29.3	14
19	3.97	31	42.5	20	32.98	45	22.6	13	40.78	35	47.9	16	7.26	34	30.7	16
29	4.28	30	40.5	19	33.43	45	23.9	16	41.13	35	49.5	19	7.60	34	32.3	19
Juli 9	4.58	30	38.6	18	33.88	43	25.5	20	41.48	33	51.4	21	7.94	33	34.2	21
19	4.88	28	36.8	16	34.31	41	27.5	24	41.81	31	53.5	23	8.27	31	36.3	22
29	5.16	25	35.2	14	34.72	37	29.9	26	42.12	29	55.8	24	8.58	28	38.5	24
Aug. 8	5.41	22	33.8	11	35.09	32	32.5	29	42.41	25	58.2	25	8.86	25	40.9	24
18	5.63	19	32.7	9	35.41	28	35.4	30	42.66	22	60.7	25	9.11	21	43.3	23
28	5.82	15	31.8	6	35.69	22	38.4	31	42.88	17	63.2	24	9.32	18	45.6	23
Sept. 7	5.97	12	31.2	3	35.91	17	41.5	31	43.05	13	65.6	24	9.50	13	47.9	22
17	6.09	7	30.9	1	36.08	12	44.6	31	43.18	10	68.0	22	9.63	10	50.1	21
27	6.16	4	30.8	— 2	36.20	6	47.7	30	43.28	6	70.2	20	9.73	6	52.2	19
Oct. 7	6.20	1	31.0	4	36.26	0	50.7	28	43.34	2	72.2	19	9.79	2	54.1	17
17	6.21	— 2	31.4	5	36.26	4	53.5	26	43.36	— 2	74.1	16	9.81	— 1	55.8	14
27	6.19	5	31.9	7	36.22	8	56.1	24	43.34	5	75.7	13	9.80	4	57.2	12
Nov. 6	6.14	7	32.6	8	36.14	13	58.5	20	43.29	7	77.0	11	9.76	7	58.4	10
16	6.07	8	33.4	9	36.01	17	60.5	16	43.22	10	78.1	7	9.69	9	59.4	6
26	5.99	10	34.3	8	35.84	20	62.1	12	43.12	12	78.8	5	9.60	12	60.0	3
Dec. 6	5.89	11	35.1	8	35.64	23	63.3	7	43.00	14	79.3	0	9.48	13	60.3	0
16	5.78	12	35.9	9	35.41	26	64.0	2	42.86	16	79.3	2	9.35	14	60.3	3
26	5.66	12	36.8	7	35.15	26	64.2	— 3	42.70	16	79.1	6	9.21	16	60.0	6
36	5.54		37.5		34.89		63.9		42.54		78.5		9.05		59.4	
Mittl. Ort	2.23		55.8		30.47		27.3		38.63		47.5		5.15		29.5	
			339)				6)				7)				9)	

1902		α Cassiopejae. 2.2...2m.8. AR.	Diff.	Decl. +	Diff.	β Ceti. 2m.0. AR.	Diff.	Decl. −	Diff.	21 Cassiopej. 6m.0. AR.	Diff.	Decl. +	Diff.	o Cassiopej. 5m.0. AR.	Diff.	Decl. +	Diff.
		0h 34m		55° 59'		0h 38m		18° 31'		0h 39m		74° 27'		0h 39m		47° 44'	
Jan.	0	57.97	29	79.2	5	40.78	13	33.3	6	12.77	71	31.1	0	16.95	22	70.2	5
	10	57.68	29	78.7	9	40.65	13	33.9	3	12.06	70	31.1	7	16.73	22	69.7	10
	20	57.39	27	77.8	14	40.52	13	34.2	0	11.36	68	30.4	12	16.51	22	68.7	14
	30	57.12	25	76.4	19	40.39	11	34.2	2	10.68	62	29.2	18	16.29	20	67.3	17
Febr.	9	56.87	22	74.5	22	40.28	9	34.0	5	10.06	53	27.4	22	16.09	17	65.6	20
	19	56.65	16	72.3	24	40.19	7	33.5	8	9.53	42	25.2	27	15.92	13	63.6	22
März	1	56.49	11	69.9	25	40.12	5	32.7	10	9.11	30	22.5	29	15.79	9	61.4	22
	11	56.38	4	67.4	26	40.07	1	31.7	13	8.81	15	19.6	30	15.70	3	59.2	23
	21	56.34	— 4	64.8	28	40.06	— 2	30.4	15	8.66	0	16.6	30	15.67	— 3	56.9	22
	31	(30) 56.38	11	62.0	24	40.08	7	28.9	20	8.66	19	13.6	32	15.70	10	54.7	22
April	10	56.49	19	59.6	20	(31) 40.15	11	26.9	20	(31) 8.85	32	10.4	27	(31) 15.80	16	52.5	17
	20	56.68	26	57.6	17	40.26	16	24.9	21	9.17	46	7.7	24	15.96	22	50.8	14
	30	56.94	32	55.9	13	40.42	19	22.8	23	9.63	60	5.3	20	16.18	27	49.4	10
Mai	10	57.26	38	54.6	9	40.61	23	20.5	23	10.23	70	3.3	15	16.45	32	48.4	5
	20	57.64	43	53.7	3	40.84	26	18.2	23	10.93	78	1.8	10	16.77	36	47.9	1
	30	58.07	45	53.4	— 2	41.10	29	15.9	23	11.71	85	0.8	5	17.13	40	47.8	— 4
Juni	9	58.52	47	53.6	6	41.39	30	13.6	22	12.56	89	0.3	— 1	17.53	41	48.2	8
	19	58.99	49	54.2	11	41.69	32	11.4	20	13.45	90	0.4	7	17.94	41	49.0	13
	29	59.48	47	55.3	16	42.01	31	9.4	18	14.35	89	1.1	12	18.35	41	50.3	16
Juli	9	59.95	46	56.9	20	42.32	31	7.6	16	15.24	86	2.3	16	18.76	40	51.9	20
	19	60.41	43	58.9	23	42.63	29	6.0	12	16.10	81	3.9	21	19.16	37	53.9	23
	29	60.84	39	61.2	26	42.92	27	4.8	9	16.91	74	6.0	25	19.53	35	56.2	26
Aug.	8	61.23	35	63.8	29	43.19	24	3.9	6	17.65	66	8.5	29	19.88	30	58.8	27
	18	61.58	29	66.7	30	43.43	21	3.3	2	18.31	56	11.4	32	20.18	27	61.5	28
	28	61.87	24	69.7	32	43.64	17	3.1	— 1	18.87	45	14.6	34	20.45	21	64.3	29
Sept.	7	62.11	19	72.9	31	43.81	13	3.2	5	19.32	35	18.0	35	20.66	17	67.2	29
	17	62.30	13	76.0	32	43.94	9	3.7	8	19.67	23	21.5	36	20.83	12	70.1	29
	27	62.43	7	79.2	31	44.03	5	4.5	10	19.90	11	25.1	36	20.95	7	73.0	28
Oct.	7	62.50	1	82.3	29	44.08	2	5.5	12	20.01	— 1	28.7	36	21.02	2	75.8	25
	17	62.51	— 5	85.2	27	44.10	— 1	6.7	13	20.00	12	32.3	34	21.04	— 2	78.3	24
	27	62.46	9	87.9	25	44.09	4	8.0	14	19.88	24	35.7	31	21.02	6	80.7	21
Nov.	6	62.37	13	90.4	22	44.05	7	9.4	14	19.64	35	38.8	28	20.96	9	82.8	18
	16	62.24	18	92.6	17	43.98	9	10.8	14	19.29	45	41.6	25	20.87	14	84.6	14
	26	62.06	22	94.3	13	43.89	11	12.2	12	18.84	54	44.1	19	20.73	16	86.0	11
Dec.	6	61.84	25	95.6	9	43.78	12	13.4	11	18.30	61	46.0	15	20.57	19	87.1	6
	16	61.59	27	96.5	3	43.66	13	14.5	9	17.69	67	47.5	9	20.38	21	87.7	1
	26	61.32	29	96.8	— 2	43.53	14	15.4	7	17.02	71	48.4	3	20.17	22	87.8	— 3
	36	61.03		96.6		43.39		16.1		16.31		48.7		19.95		87.5	
Mittl. Ort		56.44		59.6		40.22		28.9		9.98		8.5		15.59		52.7	
		10)				540)				340)				341)			

1902	ζ Andromed. $4^m.1$. AR.		Decl. +		γ Cassiopej. $2^m.0$. AR.		Decl. +		μ Andromed. $4^m.0$. AR.		Decl. +		ε Piscium. $4^m.0$. AR.		Decl. +	
	$0^h\ 42^m$		23° 44′		$0^h\ 50^m$		60° 11′		$0^h\ 51^m$		37° 58′		$0^h\ 57^m$		7° 21′	
Jan. 0	9.50 s		13.2 ″		49.15 s		29.5 ″		20.04 s		19.1 ″		52.26 s		49.6 ″	
		14		8		33		2		18		5		12		7
10	9.36		12.4		48.82		29.3		19.86		18.6		52.14		48.9	
		14		9		34		8		18		9		13		8
20	9.22		11.5		48.48		28.5		19.68		17.7		52.01		48.1	
		13		11		33		12		17		13		12		7
30	9.09		10.4		48.15		27.3		19.51		16.4		51.89		47.4	
		13		13		31		17		17		15		12		7
Febr. 9	8.96		9.1		47.84		25.6		19.34		14.9		51.77		46.7	
		11		13		27		21		14		16		11		7
19	8.85		7.8		47.57		23.5		19.20		13.3		51.66		46.0	
		8		13		22		23		11		19		8		6
März 1	8.77		6.5		47.35		21.2		19.09		11.4		51.58		45.4	
		5		13		15		26		8		19		6		4
11	8.72		5.2		47.20		18.6		19.01		9.5		51.52		45.0	
		1		12		8		27		4		18		3		2
21	8.71	—	4.0		47.12		15.9		18.97	—	7.7		51.49	—	44.8	
		2		10		0		27		2		17		1		0
31	8.73		3.0		47.12		13.2		18.99		6.0		51.50		44.8	
		8		8		10		27		8		17		6		2
April 10	8.81		2.2		47.22		10.5		19.07		4.3		51.56		45.0	
		12		5		18		23		12		13		10		5
20	8.93		1.7		47.40		8.2		19.19		3.0		51.66		45.5	
		17		1		26		20		18		10		14		7
30	9.10		1.6	—	47.66		6.2		19.37		2.0		51.80		46.2	
		21		2		33		16		24		5		18		10
Mai 10	9.31		1.8		47.99		4.6		19.61		1.5		51.98		47.2	
		25		5		40		11		27		2		22		13
20	9.56		2.3		48.39		3.5		19.88		1.3	—	52.20		48.5	
		28		9		45		6		31		2		25		14
30	9.84		3.2		48.84		2.9		20.19		1.5		52.45		49.9	
		31		12		49		2		34		6		28		17
Juni 9	10.15		4.4		49.33		2.7	—	20.53		2.1		52.73		51.6	
		32		14		52		3		36		10		30		18
19	10.47		5.8		49.85		3.0		20.89		3.1		53.03		53.4	
		33		17		53		9		37		14		30		18
29	10.80		7.5		50.38		3.9		21.26		4.5		53.33		55.2	
		32		19		52		13		36		17		31		20
Juli 9	11.12		9.4		50.90		5.2		21.62		6.2		53.64		57.2	
		32		20		52		17		36		19		30		19
19	11.44		11.4		51.42		6.9		21.98		8.1		53.94		59.1	
		30		22		49		21		34		22		29		18
29	11.74		13.6		51.91		9.0		22.32		10.3		54.23		60.9	
		27		21		45		25		31		23		27		18
Aug. 8	12.01		15.7		52.36		11.5		22.63		12.6		54.50		62.7	
		25		22		40		27		28		25		24		16
18	12.26		17.9		52.76		14.2		22.91		15.1		54.74		64.3	
		21		21		35		30		25		25		21		14
28	12.47		20.0		53.11		17.2		23.16		17.6		54.95		65.7	
		17		20		30		31		21		26		18		12
Sept. 7	12.64		22.0		53.41		20.3		23.37		20.2		55.13		66.9	
		14		18		23		33		16		25		15		10
17	12.78		23.8		53.64		23.6		23.53		22.7		55.28		67.9	
		10		17		17		32		13		24		11		7
27	12.88		25.5		53.81		26.8		23.66		25.1		55.39		68.6	
		7		16		11		32		8		22		8		6
Oct. 7	12.95		27.1		53.92		30.0		23.74		27.3		55.47		69.2	
		3		13		4		31		5		21		4		3
17	12.98		28.4		53.96	—	33.1		23.79		29.4		55.51		69.5	
		0		11		2		30		0		19		2		1
27	12.98		29.5		53.94		36.1		23.79		31.3		55.53	—	69.6	—
		3		8		7		27		2		17		1		1
Nov. 6	12.95		30.3		53.87		38.8		23.77		33.0		55.52		69.5	
		5		6		14		24		6		14		4		3
16	12.90		30.9		53.73		41.2		23.71		34.4		55.48		69.2	
		8		4		19		20		9		11		6		3
26	12.82		31.3		53.54		43.2		23.62		35.5		55.42		68.9	
		10		1		23		17		12		7		8		5
Dec. 6	12.72		31.4	—	53.31		44.9		23.50		36.2		55.34		68.4	
		12		2		27		11		14		3		10		6
16	12.60		31.2		53.04		46.0		23.36		36.5		55.24		67.8	
		13		4		31		6		16		0		11		7
26	12.47		30.8		52.73		46.6		23.20		36.5		55.13		67.1	
		14		6		33		0		18		3		12		7
36	12.33		30.2		52.40		46.6		23.02		36.2		55.01		66.4	
Mittl. Ort	8.49		3.0		47.26		9.6		18.76		4.7		51.33		45.7	
	11)				13)				14)				15)			

1902	β Andromed. 2ᵐ.3. AR.		Decl. +		υ Piscium. 4ᵐ.1. AR.		Decl. +		ϑ Ceti. 3ᵐ.0. AR.		Decl. −		δ Cassiopej. 2ᵐ.8. AR.		Decl. +	
	1ʰ 4ᵐ		35° 6′		1ʰ 14ᵐ		26° 44′		1ʰ 19ᵐ		8° 40′		1ʰ 19ᵐ		59° 43′	
Jan. 0	15.90	17	17.6	5	5.90	14	66.5	5	8.36	12	82.6	8	26.21	32	53.1	2
10	15.73	17	17.1	8	5.76	15	66.0	8	8.24	13	83.4	6	25.89	33	53.3	— 4
20	15.56	17	16.3	11	5.61	15	65.2	10	8.11	14	84.0	5	25.56	34	52.9	9
30	15.39	16	15.2	13	5.46	15	64.2	11	7.97	13	84.5	2	25.22	32	52.0	14
Febr. 9	15.23	14	13.9	15	5.31	14	63.1	13	7.84	12	84.7	0	24.90	30	50.6	18
19	15.09	12	12.4	17	5.17	11	61.8	13	7.72	10	84.7	2	24.60	25	48.8	21
März 1	14.97	9	10.7	17	5.06	8	60.5	13	7.62	8	84.5	4	24.35	19	46.7	24
11	14.88	5	9.0	17	4.98	5	59.2	13	7.54	5	84.1	6	24.16	13	44.3	25
21	14.83	0	7.3	16	4.93	1	57.9	11	7.49	1	83.5	9	24.03	5	41.8	26
31	14.83	6	5.7	16	4.92	— 4	56.8	9	7.48	— 2	82.6	12	23.98	— 3	39.2	26
April 10	[7] 14.89	11	4.1	11	4.96	10	55.9	8	[11] 7.50	8	81.4	15	24.01	14	36.6	26
20	15.00	17	3.0	9	[10] 5.06	14	55.1	5	7.58	12	79.9	17	[11] 24.15	21	34.0	21
30	15.17	21	2.1	5	5.20	18	54.6	1	7.70	15	78.2	17	24.36	28	31.9	17
Mai 10	15.38	25	1.6	1	5.38	23	54.5	— 2	7.85	20	76.5	19	24.64	36	30.2	14
20	15.63	29	1.5	— 2	5.61	27	54.7	6	8.05	23	74.6	21	25.00	42	28.8	9
30	15.92	33	1.7	6	5.88	30	55.3	9	8.28	26	72.5	21	25.42	46	27.9	5
Juni 9	16.25	34	2.3	10	6.18	31	56.2	12	8.54	28	70.4	21	25.88	51	27.4	0
19	16.59	36	3.3	13	6.49	33	57.4	14	8.82	30	68.3	21	26.39	52	27.4	5
29	16.95	36	4.6	16	6.82	34	58.8	16	9.12	30	66.2	19	26.91	53	27.9	10
Juli 9	17.31	35	6.2	19	7.16	33	60.4	19	9.42	30	64.3	18	27.44	52	28.9	14
19	17.66	34	8.1	21	7.49	32	62.3	20	9.72	30	62.5	16	27.96	51	30.3	18
29	18.00	31	10.2	22	7.81	30	64.3	20	10.02	28	60.9	14	28.47	47	32.1	22
Aug. 8	18.31	29	12.4	23	8.11	27	66.3	21	10.30	25	59.5	10	28.94	44	34.3	24
18	18.60	25	14.7	23	8.38	25	68.4	21	10.55	23	58.5	8	29.38	40	36.7	27
28	18.85	21	17.0	24	8.63	21	70.5	20	10.78	20	57.7	4	29.78	34	39.4	29
Sept. 7	19.06	18	19.4	23	8.84	17	72.5	19	10.98	16	57.3	1	30.12	29	42.3	31
17	19.24	13	21.7	23	9.01	14	74.4	18	11.14	13	57.2	— 2	30.41	22	45.4	31
27	19.37	10	24.0	21	9.15	11	76.2	16	11.27	10	57.4	5	30.63	17	48.5	31
Oct. 7	19.47	6	26.1	19	9.26	7	77.8	15	11.37	6	57.9	6	30.80	11	51.6	30
17	19.53	3	28.0	17	9.33	3	79.3	12	11.43	3	58.5	9	30.91	5	54.6	30
27	19.56	— 1	29.7	15	9.36	0	80.5	11	11.46	0	59.4	11	30.96	— 2	57.6	28
Nov. 6	19.55	5	31.2	13	9.36	2	81.6	8	11.46	2	60.5	11	30.94	8	60.4	25
16	19.50	7	32.5	10	9.34	5	82.4	6	11.44	5	61.6	11	30.86	13	62.9	22
26	19.43	10	33.5	7	9.29	8	83.0	4	11.39	8	62.7	12	30.73	18	65.1	18
Dec. 6	19.33	12	34.2	3	9.21	11	83.4	1	11.31	10	63.9	10	30.55	24	66.9	14
16	19.21	14	34.5	0	9.10	12	83.5	— 2	11.21	11	64.9	10	30.31	28	68.3	9
26	19.07	16	34.5	3	8.98	14	83.3	4	11.10	12	65.9	9	30.03	31	69.2	4
36	18.91		34.2		8.84		82.9		10.98		66.8		29.72		69.6	
Mittl. Ort	14.57		4.7		4.63		56.6		7.47		80.1		23.97		34.7	
		16)				18)				21)				20)		

1902	η Piscium. $3^m.6$.				40 Cassiopej. $5^m.6$.				υ Persei. $3^m.6$.				43 Cassiopej. $6^m.0$.			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	$1^h\ 26^m$		$14^\circ\ 50'$		$1^h\ 30^m$		$72^\circ\ 32'$		$1^h\ 31^m$		$48^\circ\ 7'$		$1^h\ 35^m$		$67^\circ\ 32'$	
	s		"		s		"		s		"		s		"	
Jan. 0	15.41	13	31.7	7	43.97	59	46.2	6	60.23	21	69.9	1	7.47	42	69.7	5
10	15.28	13	31.0	7	43.38	62	46.8	0	60.02	23	69.8	4	7.05	48	70.2	0
20	15.15	14	30.3	8	42.76	62	46.8	5	59.79	24	69.4	8	6.57	48	70.2	7
30	15.01	14	29.5	8	42.14	61	46.3	12	59.55	23	68.6	12	6.09	46	69.5	11
Febr. 9	14.87	12	28.7	9	41.53	56	45.1	17	59.32	22	67.4	16	5.63	43	68.4	16
19	14.75	11	27.8	8	40.97	49	43.4	21	59.10	19	65.8	19	5.20	38	66.8	21
März 1	14.64	9	27.0	8	40.48	39	41.3	25	58.91	15	63.9	20	4.82	30	64.7	24
11	14.55	6	26.2	6	40.09	28	38.8	27	58.76	10	61.9	21	4.52	22	62.3	26
21	14.49	1	25.6	5	39.81	16	36.1	29	58.66	4	59.8	21	4.30	12	59.7	28
31	14.48	— 2	25.1	2	39.65	1	33.2	29	58.62	— 2	57.7	20	4.18	1	56.9	27
April 10	14.50	8	24.9	1 —	39.64	— 15	30.3	31	58.64	9	55.7	21	4.17	— 11	54.2	29
20	[13] 14.58	12	24.8	3	[14] 39.79	28	27.2	26	[15] 58.73	15	53.6	17	[16] 4.28	22	51.3	25
30	14.70	16	25.1	5	40.07	41	24.6	23	58.88	21	51.9	13	4.50	33	48.8	22
Mai 10	14.86	21	25.6	8	40.48	52	22.3	20	59.09	28	50.6	10	4.83	42	46.6	18
20	15.07	24	26.4	10	41.00	63	20.3	15	59.37	32	49.6	5	5.25	50	44.8	14
30	15.31	27	27.4	13	41.63	71	18.8	10	59.69	36	49.1	2 —	5.75	57	43.4	9
Juni 9	15.58	29	28.7	15	42.34	76	17.8	5	60.05	39	48.9	3	6.32	63	42.5	4 —
19	15.87	31	30.2	16	43.10	81	17.3	1 —	60.44	41	49.2	7	6.95	65	42.1	1
29	16.18	31	31.8	18	43.91	83	17.2	5	60.85	42	49.9	11	7.60	67	42.2	6
Juli 9	16.49	31	33.6	18	44.74	82	17.7	10	61.27	42	51.0	14	8.27	67	42.8	10
19	16.80	31	35.4	19	45.56	81	18.7	15	61.69	41	52.4	18	8.94	65	43.8	15
29	17.11	28	37.3	18	46.37	77	20.2	19	62.10	39	54.2	20	9.59	63	45.3	19
Aug. 8	17.39	27	39.1	17	47.14	71	22.1	23	62.49	36	56.2	23	10.22	58	47.2	23
18	17.66	24	40.8	17	47.85	65	24.4	26	62.85	32	58.5	24	10.80	53	49.5	26
28	17.90	20	42.5	15	48.50	57	27.0	30	63.17	29	60.9	26	11.33	47	52.1	29
Sept. 7	18.10	18	44.0	13	49.07	49	30.0	32	63.46	24	63.5	27	11.80	40	55.0	30
17	18.28	14	45.3	11	49.56	39	33.2	33	63.70	20	66.2	26	12.20	33	58.0	32
27	18.42	11	46.4	9	49.95	29	36.5	34	63.90	16	68.8	27	12.53	25	61.2	33
Oct. 7	18.53	8	47.3	8	50.24	18	39.9	35	64.06	11	71.5	25	12.78	17	64.5	33
17	18.61	5	48.1	5	50.42	8	43.4	34	64.17	7	74.0	24	12.95	9	67.8	32
27	18.66	1	48.6	3	50.50	— 2	46.8	32	64.24	2	76.4	23	13.04	0	71.0	31
Nov. 6	18.67	— 1	48.9	2	50.48	14	50.0	31	64.26	— 3	78.7	20	13.04	8	74.1	30
16	18.66	4	49.1	0	50.34	24	53.1	27	64.23	6	80.7	18	12.96	16	77.1	26
26	18.62	6	49.1	2	50.10	34	55.8	24	64.17	11	82.5	14	12.80	24	79.7	22
Dec. 6	18.56	8	48.9	3	49.76	43	58.2	20	64.06	14	83.9	10	12.56	31	81.9	18
16	18.48	10	48.6	4	49.33	51	60.2	15	63.92	18	84.9	6	12.25	37	83.7	14
26	18.38	12	48.2	6	48.82	57	61.7	9	63.74	20	85.5	2	11.88	43	85.1	8
36	18.26		47.6		48.25		62.6		63.54		85.7		11.45		85.9	
Mittl. Ort	14.22		26.3		40.30		26.4		58.36		54.7		4.41		50.8	
			22)				347)				23)				348)	

1902	φ Persei. 4ᵐ.0.				τ Ceti. 3ᵐ.3.				o Piscium. 4ᵐ.1.				Lac. ε Sculpt. 5ᵐ.1.			
	AR.		Decl. +		AR.		Decl. −		AR.		Decl. +		AR.		Decl. −	
	1ʰ 37ᵐ		50° 11′		1ʰ 39ᵐ		16° 26′		1ʰ 40ᵐ		8° 39′		1ʰ 41ᵐ		25° 32′	
Jan. 0	32.80	23	57.5	1	31.78	14	79.0	8	14.18	11	55.3	7	4.13	16	41.9	9
10	32.57	24	57.6	—4	31.64	14	79.8	6	14.07	13	54.6	8	3.97	16	42.8	6
20	32.33	25	57.2	7	31.50	15	80.4	3	13.94	14	53.8	7	3.81	16	43.4	2
30	32.08	25	56.5	12	31.35	15	80.7	1	13.80	14	53.1	7	3.65	16	43.6	—2
Febr. 9	31.83	23	55.3	15	31.20	14	80.8	—2	13.66	13	52.4	6	3.49	15	43.4	5
19	31.60	20	53.8	18	31.06	12	80.6	5	13.53	12	51.8	5	3.34	14	42.9	9
März 1	31.40	17	52.0	21	30.94	10	80.1	8	13.41	9	51.3	5	3.20	11	42.0	11
11	31.23	12	49.9	22	30.84	8	79.3	11	13.32	7	50.8	3	3.09	8	40.9	15
21	31.11	6	47.7	22	30.76	4	78.2	13	13.25	3	50.5	1	3.01	5	39.4	18
31	31.05	—1	45.5	21	30.72	1	76.9	16	13.22	—1	50.4	—1	2.96	1	37.6	21
April 10	31.06	9	43.4	22	30.71	—4	75.3	20	13.23	6	50.5	4	2.95	—4	35.5	25
20	[16]31.15	15	41.2	17	[17]30.75	9	73.3	21	[17]13.29	10	50.9	6	[17]2.99	9	33.0	24
30	31.30	22	39.5	15	30.84	13	71.2	22	13.39	15	51.5	8	3.08	13	30.6	26
Mai 10	31.52	27	38.0	11	30.97	18	69.0	23	13.54	19	52.3	11	3.21	18	28.0	27
20	31.79	33	36.9	7	31.15	21	66.7	23	13.73	22	53.4	13	3.39	22	25.3	26
30	32.12	37	36.2	2	31.36	24	64.4	24	13.95	26	54.7	15	3.61	25	22.7	26
Juni 9	32.49	40	36.0	—1	31.60	28	62.0	24	14.21	28	56.2	16	3.86	28	20.1	25
19	32.89	42	36.1	6	31.88	29	59.6	22	14.49	29	57.8	17	4.14	30	17.6	23
29	33.31	44	36.7	10	32.17	30	57.4	20	14.78	31	59.5	18	4.44	32	15.3	20
Juli 9	33.75	44	37.7	13	32.47	30	55.4	18	15.09	31	61.3	18	4.76	32	13.3	18
19	34.19	42	39.0	17	32.77	30	53.6	16	15.40	30	63.1	18	5.08	32	11.5	14
29	34.61	40	40.7	20	33.07	29	52.0	12	15.70	28	64.9	16	5.40	30	10.1	10
Aug. 8	35.01	38	42.7	22	33.36	27	50.8	9	15.98	27	66.5	16	5.70	28	9.1	6
18	35.39	34	44.9	24	33.63	24	49.9	5	16.25	24	68.1	14	5.98	26	8.5	1
28	35.73	30	47.3	26	33.87	21	49.4	1	16.49	22	69.5	12	6.24	23	8.4	—3
Sept. 7	36.03	26	49.9	27	34.08	18	49.3	—2	16.71	18	70.7	10	6.47	19	8.7	6
17	36.29	22	52.6	27	34.26	15	49.5	5	16.89	15	71.7	8	6.66	15	9.3	11
27	36.51	17	55.3	27	34.41	11	50.0	9	17.04	12	72.5	5	6.81	12	10.4	14
Oct. 7	36.68	12	58.0	26	34.52	8	50.9	11	17.16	9	73.0	3	6.93	9	11.8	16
17	36.80	8	60.6	25	34.60	5	52.0	13	17.25	6	73.3	2	7.02	4	13.4	18
27	36.88	3	63.1	24	34.65	1	53.3	15	17.31	3	73.5	—1	7.06	1	15.2	20
Nov. 6	36.91	—2	65.5	21	34.66	—2	54.8	16	17.34	0	73.4	2	7.07	—3	17.2	19
16	36.89	6	67.6	19	34.64	5	56.4	15	17.34	3	73.2	3	7.04	5	19.1	19
26	36.83	11	69.5	15	34.59	7	57.9	15	17.31	5	72.9	5	6.99	8	21.0	18
Dec. 6	36.72	15	71.0	12	34.52	9	59.4	13	17.26	7	72.4	5	6.91	10	22.8	16
16	36.57	18	72.2	8	34.43	12	60.7	11	17.19	9	71.9	6	6.81	13	24.4	14
26	36.39	22	73.0	3	34.31	13	61.8	10	17.10	11	71.3	7	6.68	15	25.8	10
36	36.17		73.3		34.18		62.8		16.99		70.6		6.53		26.8	
Mittl. Ort	30.80		42.1		30.84		73.2		12.99		52.6		3.26		33.3	
			24)				542)				25)				543)	

1902	ζ Ceti. $3^m.0$ AR.	Diff.	Decl. −	Diff.	ε Cassiopej. $3^m.3$ AR.	Diff.	Decl. +	Diff.	α Trianguli. $3^m.6$ AR.	Diff.	Decl. +	Diff.	ξ Piscium. $4^m.0$ AR.	Diff.	Decl. +	Diff.
	$1^h\ 46^m$		$10°\ 48'$		$1^h\ 47^m$		$63°\ 11'$		$1^h\ 47^m$		$29°\ 6'$		$1^h\ 48^m$		$2°\ 42'$	
Jan. 0	38.35		73.0		23.08		32.8		31.11		14.6		30.03		13.9	
10	38.23	12	73.9	9	22.73	35	33.3	5	30.97	14	14.3	3	29.91	12	13.2	7
20	38.09	14	74.5	6	22.36	37	33.3	0	30.82	15	13.8	5	29.78	13	12.5	7
30	37.95	14	75.0	5	21.97	39	32.8	5	30.65	17	13.0	8	29.65	13	11.8	7
Febr. 9	37.81	14	75.3	3	21.58	39	31.8	10	30.49	16	12.0	10	29.51	14	11.3	5
19	37.67	14	75.3	0	21.21	37	30.3	15	30.33	16	10.9	11	29.38	13	10.8	5
März 1	37.54	13	75.1	2	20.89	32	28.4	19	30.19	14	9.7	12	29.26	12	10.5	3
11	37.44	10	74.6	5	20.62	27	26.2	22	30.07	12	8.4	13	29.16	10	10.3	2
21	37.36	8	73.9	7	20.42	20	23.7	25	29.98	9	7.1	13	29.08	8	10.4	1
31	37.32	4	72.9	10	20.30	12	21.1	26	29.94	4	5.9	12	29.04	4	10.6	2
April 10	37.32	0	71.6	13	20.27	3	18.5	26	29.94	0	4.8	11	29.04	0	11.0	4
20	[19] 37.37	5	70.0	16	[19] 20.35	8	15.7	28	[19] 30.00	6	3.8	10	[19] 29.09	5	11.8	8
30	37.45	8	68.3	17	20.52	17	13.3	24	30.11	11	3.1	7	29.18	9	12.7	9
Mai 10	37.58	13	66.4	19	20.79	27	11.3	20	30.27	16	2.7	4	29.32	14	13.8	11
20	37.75	17	64.4	20	21.13	34	9.6	17	30.47	20	2.7	0	29.49	17	15.2	14
30	37.96	21	62.3	21	21.55	42	8.2	14	30.72	25	2.9	2	29.70	21	16.7	15
Juni 9	38.21	25	60.1	22	22.03	48	7.3	9	31.00	28	3.5	6	29.95	25	18.4	17
19	38.48	27	57.9	22	22.56	53	6.9	4	31.31	31	4.3	8	30.22	27	20.2	18
29	38.77	29	55.8	21	23.12	56	7.0	1	31.64	33	5.4	11	30.51	29	22.1	19
Juli 9	39.07	30	53.8	20	23.70	58	7.5	5	31.98	34	6.8	14	30.81	30	23.9	18
19	39.37	30	52.0	18	24.29	59	8.5	10	32.32	34	8.4	16	31.11	30	25.7	18
29	39.67	30	50.4	16	24.86	57	9.9	14	32.65	33	10.1	17	31.41	30	27.5	18
Aug. 8	39.96	29	49.0	14	25.41	55	11.7	18	32.97	32	11.9	18	31.70	29	29.1	16
18	40.23	27	48.0	10	25.93	52	13.8	21	33.27	30	13.9	20	31.97	27	30.5	14
28	40.47	24	47.3	7	26.40	47	16.3	25	33.54	27	15.8	19	32.21	24	31.6	11
Sept. 7	40.69	22	46.9	4	26.83	43	19.0	27	33.78	24	17.7	19	32.43	22	32.6	10
17	40.88	19	46.8	1	27.20	37	21.9	29	34.00	22	19.6	19	32.62	19	33.3	7
27	41.04	16	47.1	3	27.51	31	24.9	30	34.18	18	21.4	18	32.78	16	33.7	4
Oct. 7	41.16	12	47.7	6	27.76	25	28.0	31	34.32	14	23.1	17	32.90	12	33.9	2
17	41.25	9	48.6	9	27.94	18	31.1	31	34.43	11	24.6	15	33.00	10	33.8	1
27	41.30	5	49.6	10	28.05	11	34.2	31	34.51	8	25.9	13	33.06	6	33.6	2
Nov. 6	41.33	3	50.8	12	28.09	4	37.1	29	34.55	4	27.1	12	33.10	4	33.2	4
16	41.33	0	52.1	13	28.06	3	39.9	28	34.56	1	28.1	10	33.11	1	32.6	6
26	41.30	3	53.4	13	27.97	9	42.4	25	34.54	2	28.9	8	33.09	2	32.0	6
Dec. 6	41.24	6	54.7	13	27.80	17	44.6	22	34.49	5	29.5	6	33.04	5	31.3	7
16	41.16	8	56.0	13	27.57	23	46.3	17	34.40	9	29.8	3	32.97	7	30.5	8
26	41.05	11	57.1	11	27.28	29	47.6	13	34.29	11	29.8	0	32.88	9	29.7	8
36	40.93	12	58.0	9	26.95	33	48.5	9	34.16	13	29.7	1	32.77	11	28.9	8
Mittl. Ort	37.32		68.8		20.26		15.3		29.58		5.6		28.85		13.7	
	544)				26)				27)				29)			

1902	β Arietis. 2ᵐ.8.				50 Cassiopej. 4ᵐ.0.				υ Ceti. 4ᵐ.0.				γ Andromed. 2ᵐ.4.			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. —		AR.		Decl. +	
	$1^h\ 49^m$		20° 19′		$1^h\ 55^m$		71° 56′		$1^h\ 55^m$		21° 32′		$1^h\ 57^m$		41° 51′	
Jan. 0	14.82ˢ	12	51.0″	4	7.29ˢ	54	68.2″	9	24.18ˢ	14	78.1″	9	54.68ˢ	18	46.5″	1
10	14.70	14	50.6	7	6.75	59	69.1	3	24.04	15	79.0	7	54.50	19	46.6	— 2
20	14.56	15	49.9	7	6.16	61	69.4	— 3	23.89	16	79.7	4	54.31	20	46.4	6
30	14.41	15	49.2	9	5.55	60	69.1	8	23.73	16	80.1	0	54.11	21	45.8	10
Febr. 9	14.26	14	48.3	9	4.95	57	68.3	14	23.57	16	80.1	3	53.90	20	44.8	13
19	14.12	13	47.4	9	4.38	51	66.9	19	23.41	14	79.8	6	53.70	19	43.5	15
März 1	13.99	11	46.5	10	3.87	44	65.0	23	23.27	12	79.2	10	53.51	15	42.0	17
11	13.88	8	45.5	9	3.43	33	62.7	25	23.15	9	78.2	12	53.36	12	40.3	17
21	13.80	4	44.6	7	3.10	22	60.2	28	23.06	6	77.0	15	53.24	7	38.6	18
31	13.76	0	43.9	6	2.88	8	57.4	28	23.00	2	75.5	18	53.17	2	36.8	18
April 10	13.76	6	43.3	4	2.80	— 6	54.6	28	22.98	— 2	73.7	21	53.15	— 5	35.0	16
20	[19] 13.82	10	42.9	2	2.86	21	51.8	30	23.00	8	71.6	24	53.20	11	33.4	15
30	13.92	14	42.7	— 1	[21] 3.07	33	48.8	24	[21] 23.08	12	69.2	24	[22] 53.31	17	31.9	11
Mai 10	14.06	19	42.8	4	3.40	46	46.4	21	23.20	16	66.8	25	53.48	23	30.8	8
20	14.25	23	43.2	7	3.86	56	44.3	18	23.36	21	64.3	25	53.71	27	30.0	5
30	14.48	27	43.9	9	4.42	64	42.5	13	23.57	24	61.8	26	53.98	31	29.5	1
Juni 9	14.75	29	44.8	12	5.06	72	41.2	8	23.81	26	59.2	24	54.29	35	29.4	— 3
19	15.04	31	46.0	14	5.78	77	40.4	3	24.07	29	56.8	23	54.64	37	29.7	6
29	15.35	32	47.4	15	6.55	81	40.1	— 2	24.36	31	54.5	21	55.01	38	30.3	10
Juli 9	15.67	32	48.9	17	7.36	81	40.3	7	24.67	31	52.4	19	55.39	38	31.3	13
19	15.99	31	50.6	17	8.17	80	41.0	12	24.98	31	50.5	15	55.77	38	32.6	15
29	16.30	30	52.3	18	8.97	78	42.2	16	25.29	30	49.0	12	56.15	37	34.1	18
Aug. 8	16.60	29	54.1	18	9.75	74	43.8	20	25.59	29	47.8	7	56.52	35	35.9	20
18	16.89	26	55.9	17	10.49	68	45.8	24	25.88	26	47.1	4	56.87	32	37.9	21
28	17.15	23	57.6	16	11.17	62	48.2	26	26.14	23	46.7	— 1	57.19	29	40.0	22
Sept. 7	17.38	20	59.2	15	11.79	54	50.8	30	26.37	20	46.8	4	57.48	25	42.2	23
17	17.58	17	60.7	14	12.33	45	53.8	31	26.57	17	47.2	8	57.73	22	44.5	23
27	17.75	14	62.1	12	12.78	37	56.9	33	26.74	13	48.0	12	57.95	18	46.8	22
Oct. 7	17.89	10	63.3	10	13.15	27	60.2	33	26.87	10	49.2	14	58.13	14	49.0	22
17	17.99	8	64.3	8	13.42	16	63.5	34	26.97	6	50.6	17	58.27	10	51.2	21
27	18.07	4	65.1	7	13.58	6	66.9	33	27.03	3	52.3	18	58.37	6	53.3	19
Nov. 6	18.11	1	65.8	4	13.64	— 5	70.2	31	27.06	— 1	54.1	18	58.43	2	55.2	17
16	18.12	— 2	66.2	3	13.59	16	73.3	29	27.05	3	55.9	18	58.45	— 2	56.9	15
26	18.10	4	66.5	2	13.43	26	76.2	25	27.02	7	57.7	18	58.43	6	58.4	13
Dec. 6	18.06	7	66.7	— 1	13.17	35	78.7	22	26.95	9	59.5	16	58.37	10	59.7	9
16	17.99	10	66.6	2	12.82	44	80.9	17	26.86	11	61.1	13	58.27	13	60.6	6
26	17.89	11	66.4	4	12.38	52	82.6	11	26.75	13	62.4	11	58.14	16	61.2	3
36	17.78		66.0		11.86		83.7		26.62		63.5		57.98		61.5	
Mittl. Ort	13.42		44.9		3.25		50.0		23.19		70.2		52.78		34.4	
	30)				31)				545)				32)			

1902	α Arietis. $2^m.0$				β Trianguli. $3^m.0$				55 Cassiopej. $6^m.1$				Lac. μ Forn. $5^m.2$			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. +		AR.		Decl. —	
	$2^h\ 1^m$		22° 59′		$2^h\ 3^m$		34° 31′		$2^h\ 6^m$		66° 3′		$2^h\ 8^m$		31° 10′	
Jan. 0	40.30	12	63.7	3	44.33	14	35.8	1	50.40	38	71.3	9	36.46	17	72.7	11
10	40.18	14	63.4	6	44.19	16	35.7	4	50.02	42	72.2	3	36.29	17	73.8	7
20	40.04	15	62.8	7	44.03	18	35.3	6	49.60	44	72.5	— 3	36.12	19	74.5	3
30	39.89	16	62.1	8	43.85	19	34.7	9	49.16	45	72.2	8	35.93	19	74.8	— 1
Febr. 9	39.73	16	61.3	9	43.66	18	33.8	11	48.71	43	71.4	12	35.74	18	74.7	5
19	39.57	14	60.4	10	43.48	16	32.7	13	48.28	39	70.2	17	35.56	17	74.2	9
März 1	39.43	12	59.4	10	43.32	14	31.4	14	47.89	34	68.5	21	35.39	15	73.3	13
11	39.31	9	58.4	10	43.18	11	30.0	15	47.55	27	66.4	24	35.24	12	72.0	16
21	39.22	6	57.4	9	43.07	7	28.5	14	47.28	18	64.0	26	35.12	9	70.4	20
31	39.16	1	56.5	7	43.00	2	27.1	14	47.10	8	61.4	26	35.03	4	68.4	22
April 10	39.15	— 4	55.8	6	42.98	— 4	25.7	12	47.02	— 3	58.8	27	34.99	0	66.2	25
20	39.19	10	55.2	4	43.02	10	24.5	11	47.05	15	56.1	27	34.99	5	63.7	29
30	[23] 39.29	14	54.8	1	[23] 43.12	15	23.4	7	[21] 47.20	24	53.4	23	[25] 35.04	10	60.8	28
Mai 10	39.43	18	54.7	— 2	43.27	20	22.7	5	47.44	34	51.1	20	35.14	15	58.0	29
20	39.61	22	54.9	5	43.47	25	22.2	1	47.78	43	49.1	16	35.29	20	55.1	29
30	39.83	26	55.4	8	43.72	28	22.1	— 2	48.21	50	47.5	12	35.49	23	52.2	28
Juni 9	40.09	29	56.2	10	44.00	32	22.3	5	48.71	56	46.3	7	35.72	27	49.4	26
19	40.38	31	57.2	12	44.32	34	22.8	8	49.27	60	45.6	3	35.99	30	46.8	25
29	40.69	33	58.4	14	44.66	35	23.6	11	49.87	63	45.3	— 2	36.29	31	44.3	22
Juli 9	41.02	32	59.8	16	45.01	36	24.7	14	50.50	64	45.5	6	36.60	33	42.1	19
19	41.34	32	61.4	16	45.37	35	26.1	16	51.14	64	46.1	11	36.93	33	40.2	15
29	41.66	31	63.0	17	45.72	34	27.7	17	51.78	63	47.2	16	37.26	32	38.7	10
Aug. 8	41.97	30	64.7	18	46.06	32	29.4	19	52.41	59	48.8	19	37.58	30	37.7	7
18	42.27	27	66.5	17	46.38	30	31.3	19	53.00	56	50.7	22	37.88	29	37.0	1
28	42.54	24	68.2	17	46.68	27	33.2	20	53.56	50	52.9	25	38.17	26	36.9	— 4
Sept. 7	42.78	22	69.9	15	46.95	24	35.2	20	54.06	45	55.4	28	38.43	22	37.3	9
17	43.00	19	71.4	15	47.19	21	37.2	20	54.51	38	58.2	29	38.65	18	38.2	12
27	43.19	15	72.9	13	47.40	17	39.2	18	54.89	32	61.1	31	38.83	15	39.4	16
Oct. 7	43.34	12	74.2	11	47.57	13	41.0	18	55.21	25	64.2	31	38.98	11	41.0	19
17	43.46	9	75.3	10	47.70	10	42.8	17	55.46	17	67.3	31	39.09	8	42.9	22
27	43.55	5	76.3	8	47.80	7	44.5	15	55.63	9	70.4	31	39.17	3	45.1	22
Nov. 6	43.60	3	77.1	6	47.87	3	46.0	13	55.72	1	73.5	29	39.20	0	47.3	23
16	43.63	0	77.7	5	47.90	— 1	47.3	11	55.73	— 7	76.4	27	39.20	4	49.6	23
26	43.63	4	78.2	2	47.89	4	48.4	9	55.66	15	79.1	24	39.16	8	51.9	21
Dec. 6	43.59	6	78.4	1	47.85	7	49.3	6	55.51	23	81.5	20	39.08	10	54.0	19
16	43.53	9	78.5	— 1	47.78	11	49.9	4	55.28	30	83.5	16	38.98	13	55.9	16
26	43.44	12	78.4	2	47.67	14	50.3	1	54.98	36	85.1	12	38.85	14	57.5	13
36	43.32		78.2		47.53		50.4		54.62		86.3		38.71		58.8	
Mittl. Ort	38.79		57.3		42.58		26.0		47.04		54.7		35.47		61.8	
	33)				34)				350)				546)			

1902	67 Ceti. 6m.0. AR.		Decl. −		o Ceti. 1.7...9m.0. AR.		Decl. −		ξ² Ceti. 4m.0. AR.		Decl. +		36 H.Cassiop. 5m.6. AR.		Decl. +	
	2h 12m		6° 52′		2h 14m		3° 25′		2h 22m		8° 1′		2h 28m		72° 23′	
Jan. 0	6.85	11	28.7	9	24.90	11	24.4	9	58.23	11	16.0	6	47.06	51	39.2	13
10	6.74	13	29.6	8	24.79	14	25.3	8	58.12	12	15.4	6	46.55	57	40.5	8
20	6.61	15	30.4	6	24.65	14	26.1	6	58.00	14	14.8	7	45.98	62	41.3	1
30	6.46	14	31.0	5	24.51	15	26.7	4	57.86	15	14.1	7	45.36	63	41.4	4
Febr. 9	6.32	15	31.5	2	24.36	14	27.1	3	57.71	15	13.4	5	44.73	62	41.0	10
19	6.17	14	31.7	0	24.22	14	27.4	1	57.56	14	12.9	5	44.11	58	40.0	15
März 1	6.03	12	31.7	3	24.08	12	27.5	0	57.42	13	12.4	4	43.53	52	38.5	19
11	5.91	10	31.4	5	23.96	10	27.5	3	57.29	10	12.0	2	43.01	42	36.6	23
21	5.81	6	30.9	7	23.86	6	27.2	5	57.19	7	11.8	1	42.59	31	34.3	25
31	5.75	3	30.2	10	23.80	3	26.7	8	57.12	3	11.7	1	42.28	19	31.8	28
April 10	5.72	2	29.2	11	23.77	1	25.9	10	57.09	1	11.8	3	42.09	5	29.0	28
20	5.74	6	28.1	16	23.78	7	24.9	13	57.10	6	12.1	6	42.04	9	26.2	27
30	[26] 5.80	11	26.5	16	[26] 23.85	11	23.6	15	[28] 57.16	11	12.7	8	[30] 42.13	26	23.5	29
Mai 10	5.91	15	24.9	18	23.96	15	22.1	16	57.27	15	13.5	10	42.39	38	20.6	24
20	6.06	19	23.1	20	24.11	19	20.5	17	57.42	19	14.5	11	42.77	49	18.2	20
30	6.25	23	21.1	20	24.30	22	18.8	19	57.61	22	15.6	14	43.26	60	16.2	16
Juni 9	6.48	25	19.1	21	24.52	26	16.9	20	57.83	26	17.0	15	43.86	69	14.6	12
19	6.73	28	17.0	20	24.78	27	14.9	19	58.09	28	18.5	16	44.55	75	13.4	8
29	7.01	29	15.0	20	25.05	29	13.0	19	58.37	29	20.1	17	45.30	80	12.6	3
Juli 9	7.30	30	13.0	18	25.34	30	11.1	18	58.66	30	21.8	17	46.10	83	12.3	2
19	7.60	30	11.2	17	25.64	30	9.3	17	58.96	31	23.5	16	46.93	84	12.5	7
29	7.90	29	9.5	14	25.94	29	7.6	15	59.27	29	25.1	16	47.77	84	13.2	11
Aug. 8	8.19	28	8.1	12	26.23	28	6.1	12	59.56	29	26.7	14	48.61	80	14.3	16
18	8.47	26	6.9	9	26.51	26	4.9	10	59.85	26	28.1	13	49.41	76	15.9	20
28	8.73	23	6.0	6	26.77	23	3.9	7	60.11	24	29.4	11	50.17	72	17.9	22
Sept. 7	8.96	21	5.4	2	27.00	21	3.2	4	60.35	22	30.5	8	50.89	64	20.1	26
17	9.17	17	5.2	1	27.21	18	2.8	1	60.57	19	31.3	7	51.53	57	22.7	29
27	9.34	15	5.3	4	27.39	15	2.7	2	60.76	16	32.0	4	52.10	48	25.6	30
Oct. 7	9.49	12	5.7	6	27.54	12	2.9	4	60.92	13	32.4	2	52.58	39	28.6	32
17	9.61	8	6.3	8	27.66	8	3.3	7	61.05	11	32.6	0	52.97	28	31.8	33
27	9.69	5	7.1	11	27.74	6	4.0	8	61.16	7	32.6	1	53.25	18	35.1	32
Nov. 6	9.74	3	8.2	11	27.80	3	4.8	10	61.23	4	32.5	3	53.43	6	38.3	32
16	9.77	1	9.3	12	27.83	0	5.8	11	61.27	1	32.2	4	53.49	5	41.5	30
26	9.76	3	10.5	13	27.83	3	6.9	10	61.28	1	31.8	5	53.44	16	44.5	28
Dec. 6	9.73	6	11.8	12	27.80	6	7.9	11	61.27	4	31.3	6	53.28	28	47.3	24
16	9.67	9	13.0	11	27.74	8	9.0	10	61.23	8	30.7	6	53.00	38	49.7	21
26	9.58	10	14.1	10	27.66	10	10.0	9	61.15	9	30.1	7	52.62	48	51.8	16
36	9.48		15.1		27.56		10.9		61.06		29.4		52.14		53.4	
Mittl. Ort	5.64		25.0		23.64		21.7		56.80		15.4		42.34		23.4	
	353)				35)				37)				38)			

1902	ν Arietis. 5ᵐ.6.				δ Ceti. 4ᵐ.0.				ϑ Persei. 4ᵐ.0.				π Ceti. 4ᵐ.0.			
	AR.		Decl. +		AR.		Decl. —		AR.		Decl. +		AR.		Decl. —	
	2h 33m		21° 32′		2h 34m		0° 5′		2h 37m		48° 48′		2h 39m		14° 16′	
Jan. 0	16.62		20.5		28.91		41.9		32.56		61.8		28.72		32.0	
10	16.51	11	20.2	3	28.80	11	42.7	8	32.39	17	62.4	6	28.61	11	33.1	11
20	16.38	13	19.8	4	28.68	12	43.5	8	32.17	22	62.6	2	28.48	13	34.0	9
30	16.24	14	19.3	5	28.54	14	44.2	7	31.93	24	62.5	1	28.33	15	34.7	7
Febr. 9	16.07	17	18.6	7	28.39	15	44.7	5	31.68	25	61.9	6	28.17	16	35.1	4
19	15.90	17	17.9	7	28.23	16	45.1	4	31.43	25	61.0	9	28.00	17	35.2	1
März 1	15.75	15	17.1	8	28.09	14	45.3	2	31.19	24	59.7	13	27.84	16	35.0	2
11	15.61	14	16.2	9	27.95	14	45.4	1	30.97	22	58.2	15	27.69	15	34.6	4
21	15.49	12	15.4	8	27.84	11	45.3	1	30.79	18	56.4	18	27.57	12	33.8	8
31	15.40	9	14.6	8	27.76	8	44.9	4	30.66	13	54.5	19	27.48	9	32.8	10
April 10	15.36	4	14.0	6	27.71	5	44.4	5	30.58	8	52.6	19	27.42	6	31.5	13
20	15.36	0	13.5	5	27.71	0	43.7	7	30.57	1	50.6	20	27.40	2	30.0	15
30	15.41	5	13.2	3	27.75	4	42.7	10	30.63	6	48.8	18	27.43	3	28.2	18
Mai 10	[1] 15.53	12	13.1	1	[1] 27.85	10	41.3	14	[2] 30.77	14	47.0	18	[3] 27.51	8	26.0	22
20	15.68	15	13.3	2	27.98	13	39.9	14	30.97	20	45.7	13	27.63	12	23.9	21
30	15.87	19	13.7	4	28.16	18	38.4	15	31.23	26	44.6	11	27.79	16	21.7	22
Juni 9	16.11	24	14.3	6	28.37	21	36.7	17	31.53	30	43.9	7	28.00	21	19.4	23
19	16.38	27	15.2	9	28.61	24	34.9	18	31.88	35	43.5	4	28.24	24	17.1	23
29	16.67	29	16.3	11	28.88	27	33.0	19	32.27	39	43.5	0	28.50	26	14.8	23
Juli 9	16.98	31	17.5	12	29.16	28	31.2	18	32.68	41	43.8	3	28.78	28	12.7	21
19	17.30	32	18.9	14	29.46	30	29.4	18	33.11	43	44.5	7	29.07	29	10.7	20
29	17.62	32	20.4	15	29.76	30	27.7	17	33.54	43	45.5	10	29.37	30	9.0	17
Aug. 8	17.94	32	22.0	16	30.05	29	26.2	15	33.96	42	46.8	13	29.67	30	7.6	14
18	18.24	30	23.5	15	30.33	28	24.9	13	34.37	41	48.4	16	29.96	29	6.5	11
28	18.52	28	25.0	15	30.60	27	23.9	10	34.75	38	50.2	18	30.23	27	5.8	7
Sept. 7	18.78	26	26.5	15	30.85	25	23.1	8	35.11	36	52.2	20	30.48	25	5.4	4
17	19.02	24	27.9	14	31.07	22	22.5	6	35.44	33	54.4	22	30.71	23	5.5	1
27	19.24	22	29.1	12	31.26	19	22.3	2	35.74	30	56.6	22	30.91	20	5.9	4
Oct. 7	19.42	18	30.2	11	31.43	17	22.3	0	36.00	26	58.9	23	31.08	17	6.6	7
17	19.57	15	31.2	10	31.57	14	22.6	3	36.21	21	61.2	23	31.22	14	7.7	11
27	19.69	12	32.0	8	31.68	11	23.1	5	36.38	17	63.5	23	31.33	11	9.0	13
Nov. 6	19.79	10	32.7	7	31.76	8	23.8	7	36.50	12	65.7	22	31.41	8	10.5	15
16	19.84	5	33.2	5	31.81	5	24.6	8	36.58	8	67.8	21	31.45	4	12.1	16
26	19.87	3	33.5	3	31.83	2	25.5	9	36.61	3	69.8	20	31.47	2	13.8	17
Dec. 6	19.87	0	33.7	2	31.82	1	26.4	9	36.60	1	71.5	17	31.45	2	15.5	17
16	19.83	4	33.8	1	31.78	4	27.4	10	36.53	7	73.0	15	31.40	5	17.1	16
26	19.76	7	33.8	0	31.71	7	28.3	9	36.41	12	74.1	11	31.32	8	18.5	14
36	19.66	10	33.6	2	31.62	9	29.2	9	36.25	16	74.9	8	31.22	10	19.7	12
Mittl. Ort	14.95		16.3		27.51		39.5		30.12		50.6		27.43		25.1	
	355)				39)				40)				547)			

1902	μ Ceti. 4ᵐ.0. AR.		Decl. +		41 Arietis. 3ᵐ.8. AR.		Decl. +		τ² Eridani. 4ᵐ.6. AR.		Decl. −		τ Persei. 4ᵐ.0. AR.		Decl. +	
	$2^h\ 39^m$		9° 41′		$2^h\ 44^m$		26° 51′		$2^h\ 46^m$		21° 24′		$2^h\ 47^m$		52° 21′	
Jan. 0	40.03	10	62.4	6	14.57	11	29.3	1	36.84	13	38.3	13	20.95	19	52.8	8
10	39.93	12	61.8	6	14.46	13	29.2	3	36.71	15	39.6	10	20.76	23	53.6	5
20	39.81	14	61.2	6	14.33	16	28.9	4	36.56	16	40.6	7	20.53	26	54.1	0
30	39.67	16	60.6	6	14.17	17	28.5	6	36.40	18	41.3	3	20.27	28	54.1	5
Febr. 9	39.51	15	60.0	6	14.00	18	27.9	8	36.22	18	41.6	1	19.99	28	53.6	8
19	39.36	15	59.4	5	13.82	17	27.1	8	36.04	17	41.7	— 4	19.71	27	52.8	12
März 1	39.21	14	58.9	4	13.65	15	26.3	10	35.87	16	41.3	7	19.44	25	51.6	15
11	39.07	11	58.5	3	13.50	13	25.3	10	35.71	14	40.6	10	19.19	21	50.1	18
21	38.96	8	58.2	2	13.37	10	24.3	10	35.57	11	39.6	13	18.98	15	48.3	20
31	38.88	5	58.0	0	13.27	6	23.3	9	35.46	7	38.3	16	18.83	10	46.3	20
April 10	38.83	1	58.0	2	13.21	1	22.4	8	35.39	3	36.7	19	18.73	3	44.3	21
20	38.82	— 4	58.2	4	13.20	— 4	21.6	6	35.36	— 2	34.8	21	18.70	— 5	42.2	20
30	38.86	10	58.6	7	13.24	11	21.0	5	35.38	7	32.7	25	18.75	13	40.2	20
Mai 10	[3] 38.96	13	59.3	8	[4] 13.35	15	20.5	2	[5] 35.45	11	30.2	25	[5] 18.88	19	38.2	16
20	39.09	18	60.1	10	13.50	19	20.3	— 1	35.56	15	27.7	25	19.07	25	36.6	13
30	39.27	22	61.1	12	13.69	24	20.4	3	35.71	20	25.2	26	19.32	32	35.3	9
Juni 9	39.49	25	62.3	14	13.93	27	20.7	6	35.91	23	22.6	25	19.64	36	34.4	7
19	39.74	27	63.7	15	14.20	29	21.3	8	36.14	26	20.1	25	20.00	41	33.7	2
29	40.01	29	65.2	16	14.49	32	22.1	10	36.40	29	17.6	23	20.41	43	33.5	— 1
Juli 9	40.30	30	66.8	16	14.81	33	23.1	12	36.69	30	15.3	20	20.84	44	33.6	5
19	40.60	31	68.4	16	15.14	33	24.3	13	36.99	30	13.3	17	21.28	46	34.1	8
29	40.91	30	70.0	15	15.47	33	25.6	15	37.29	30	11.6	14	21.74	45	34.9	12
Aug. 8	41.21	29	71.5	14	15.80	32	27.1	15	37.59	30	10.2	10	22.19	44	36.1	15
18	41.50	27	72.9	13	16.12	30	28.6	15	37.89	28	9.2	6	22.63	42	37.6	17
28	41.77	25	74.2	11	16.42	28	30.1	15	38.17	26	8.6	1	23.05	40	39.3	19
Sept. 7	42.02	23	75.3	9	16.70	26	31.6	15	38.43	24	8.5	— 3	23.45	36	41.2	21
17	42.25	21	76.2	7	16.96	23	33.1	14	38.67	21	8.8	7	23.81	32	43.3	23
27	42.46	18	76.9	5	17.19	20	34.5	13	38.88	18	9.5	11	24.13	29	45.6	24
Oct. 7	42.64	15	77.4	2	17.39	17	35.8	12	39.06	15	10.6	14	24.42	24	48.0	24
17	42.79	12	77.6	1	17.56	14	37.0	11	39.21	12	12.0	17	24.66	20	50.4	24
27	42.91	9	77.7	— 1	17.70	11	38.1	10	39.33	8	13.7	18	24.86	15	52.8	23
Nov. 6	43.00	6	77.6	2	17.81	7	39.1	8	39.41	4	15.5	20	25.01	10	55.1	23
16	43.06	3	77.4	4	17.88	4	39.9	7	39.45	1	17.5	21	25.11	4	57.4	22
26	43.09	0	77.0	4	17.92	1	40.6	5	39.46	— 2	19.6	20	25.15	— 1	59.6	19
Dec. 6	43.09	3	76.6	5	17.93	— 3	41.1	4	39.44	5	21.6	18	25.14	7	61.5	17
16	43.06	6	76.1	6	17.90	7	41.5	2	39.39	8	23.4	17	25.07	12	63.2	14
26	43.00	9	75.5	6	17.83	10	41.7	0	39.31	12	25.1	15	24.95	17	64.6	10
36	42.91		74.9		17.73		41.7		39.19		26.6		24.78		65.6	
Mittl. Ort	38.50		62.1		12.75		24.1		35.55		29.3		18.26		41.6	
			42)				44)				548)				45)	

1902	η Eridani. 3m.0				47 H. Cephei. 6m.0				α Ceti. 2m.3				γ Persei. 3m.0			
	AR.		Decl. −		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	2h 51m		9° 16′		2h 53m		79° 1′		2h 57m		3° 42′		2h 57m		53° 7′	
Jan. 0	39.73 s	10	82.8″	11	10.10 s	79	69.3″	18	10.81 s	9	17.3″	8	44.44 s	19	33.0″	9
10	39.63	13	83.9	9	9.31	91	71.1	12	10.72	12	16.5	7	44.25	23	33.9	6
20	39.50	15	84.8	7	8.40	100	72.3	6	10.60	14	15.8	7	44.02	26	34.5	1
30	39.35	16	85.5	5	7.40	105	72.9	1	10.46	15	15.1	6	43.76	29	34.6	—3
Febr. 9	39.19	16	86.0	3	6.35	105	73.0	—6	10.31	16	14.5	4	43.47	29	34.3	7
19	39.03	16	86.3	0	5.30	100	72.4	12	10.15	15	14.1	4	43.18	28	33.6	11
März 1	38.87	15	86.3	2	4.30	92	71.2	17	10.00	15	13.7	2	42.90	26	32.5	14
11	38.72	12	86.1	5	3.38	79	69.5	21	9.85	13	13.5	0	42.64	22	31.1	17
21	38.60	10	85.6	8	2.59	63	67.4	25	9.72	9	13.5	1	42.42	18	29.4	19
31	38.50	7	84.8	10	1.96	43	64.9	28	9.63	7	13.6	3	42.24	12	27.5	21
April 10	38.43	2	83.8	12	1.53	22	62.1	29	9.56	2	13.9	5	42.12	4	25.4	21
20	38.41	—1	82.6	14	1.31	1	59.2	29	9.54	—2	14.4	7	42.08	—3	23.3	20
30	38.42	7	81.2	19	1.30	—25	56.3	31	9.56	7	15.1	10	42.11	11	21.3	20
Mai 10	38.49	12	79.3	18	1.55	44	53.2	27	9.63	12	16.1	12	42.22	18	19.3	17
20	38.61	15	77.5	20	1.99	64	50.5	25	9.75	16	17.3	13	42.40	25	17.6	14
30	38.76	20	75.5	21	2.63	82	48.0	21	9.91	19	18.6	14	42.65	31	16.2	11
Juni 9	38.96	23	73.4	21	3.45	96	45.9	17	10.10	23	20.0	16	42.96	36	15.1	7
19	39.19	25	71.3	21	4.41	110	44.2	12	10.33	26	21.6	17	43.32	40	14.4	4
29	39.44	28	69.2	21	5.51	118	43.0	8	10.59	28	23.3	17	43.72	43	14.0	1
Juli 9	39.72	29	67.1	19	6.69	126	42.2	3	10.87	29	25.0	16	44.15	45	13.9	—4
19	40.01	29	65.2	17	7.95	129	41.9	—2	11.16	29	26.6	16	44.60	46	14.3	7
29	40.30	30	63.5	14	9.24	130	42.1	7	11.45	30	28.2	15	45.06	46	15.0	10
Aug. 8	40.60	28	62.1	12	10.54	128	42.8	11	11.75	29	29.7	13	45.52	45	16.0	13
18	40.88	27	60.9	9	11.82	124	43.9	15	12.04	28	31.0	11	45.97	44	17.3	16
28	41.15	26	60.0	5	13.06	118	45.4	20	12.32	26	32.1	9	46.41	41	18.9	18
Sept. 7	41.41	23	59.5	2	14.24	109	47.4	23	12.58	23	33.0	6	46.82	38	20.7	20
17	41.64	21	59.3	—2	15.33	98	49.7	27	12.81	21	33.6	4	47.20	34	22.7	22
27	41.85	18	59.5	5	16.31	85	52.4	30	13.02	19	34.0	1	47.54	31	24.9	23
Oct. 7	42.03	16	60.0	8	17.16	71	55.4	31	13.21	16	34.1	—1	47.85	26	27.2	24
17	42.19	12	60.8	11	17.87	56	58.5	33	13.37	14	34.0	3	48.11	22	29.6	24
27	42.31	10	61.9	12	18.43	38	61.8	34	13.51	10	33.7	5	48.33	17	32.0	24
Nov. 6	42.41	6	63.1	14	18.81	19	65.2	34	13.61	8	33.2	6	48.50	12	34.4	23
16	42.47	2	64.5	15	19.00	1	68.6	32	13.69	4	32.6	7	48.62	6	36.7	22
26	42.49	0	66.0	14	19.01	—19	71.8	31	13.73	1	31.9	8	48.68	0	38.9	20
Dec. 6	42.49	3	67.4	14	18.82	38	74.9	29	13.74	—2	31.1	9	48.68	5	40.9	17
16	42.46	6	68.8	14	18.44	56	77.8	25	13.72	5	30.2	8	48.63	11	42.6	15
26	42.40	10	70.2	12	17.88	72	80.3	20	13.67	8	29.4	8	48.52	17	44.1	11
36	42.30		71.4		17.16		82.3		13.59		28.6		48.35		45.2	
Mittl. Ort	38.33		77.0		2.34		54.8		9.26		19.5		41.62		22.5	
	46)				358)				47)				48)			

1902	ρ Persei. 3.4...4^m.2.				β Persei. 2.2...3^m.7.			
	AR.		Decl. +		AR.		Decl. +	
	$2^h\ 58^m$		38° 27′		$3^h\ 1^m$		40° 34′	
	s		″		s		″	
Jan. 0	55.79	12	46.2	4	49.58	13	49.4	5
10	55.67	16	46.6	1	49.45	16	49.9	2
20	55.51	19	46.7	— 1	49.29	19	50.1	— 1
30	55.32	20	46.6	5	49.10	21	50.0	4
Febr. 9	55.12	21	46.1	7	48.89	22	49.6	7
19	54.91	21	45.4	9	48.67	21	48.9	9
März 1	54.70	19	44.5	12	48.46	20	48.0	12
11	54.51	16	43.3	13	48.26	18	46.8	13
21	54.35	13	42.0	14	48.08	13	45.5	15
31	54.22	8	40.6	15	47.95	9	44.0	15
April 10	54.14	3	39.1	14	47.86	4	42.5	15
20	54.11	— 2	37.7	13	47.82	— 3	41.0	14
30	54.13	10	36.4	12	47.85	9	39.6	14
Mai 10	54.23	15	35.2	9	47.94	15	38.2	10
20	54.38	20	34.3	6	48.09	20	37.2	8
30	54.58	25	33.7	4	48.29	25	36.4	5
Juni 9	54.83	29	33.3	1	48.54	30	35.9	2
19	55.12	33	33.2	— 2	48.84	33	35.7	— 1
29	55.45	34	33.4	5	49.17	35	35.8	4
Juli 9	55.79	36	33.9	8	49.52	37	36.2	7
19	56.15	37	34.7	10	49.89	38	36.9	9
29	56.52	37	35.7	12	50.27	38	37.8	12
Aug. 8	56.89	36	36.9	14	50.65	37	39.0	13
18	57.25	34	38.3	15	51.02	35	40.3	15
28	57.59	33	39.8	16	51.37	34	41.8	16
Sept. 7	57.92	30	41.4	17	51.71	31	43.4	18
17	58.22	27	43.1	18	52.02	28	45.2	18
27	58.49	25	44.9	17	52.30	25	47.0	18
Oct. 7	58.74	21	46.6	17	52.55	22	48.8	18
17	58.95	17	48.3	17	52.77	18	50.6	17
27	59.12	14	50.0	16	52.95	15	52.3	17
Nov. 6	59.26	10	51.6	15	53.10	11	54.0	17
16	59.36	6	53.1	13	53.21	6	55.7	15
26	59.42	2	54.4	12	53.27	2	57.2	13
Dec. 6	59.44	— 2	55.6	11	53.29	— 3	58.5	11
16	59.42	7	56.7	8	53.26	6	59.6	9
26	59.35	11	57.5	5	53.20	11	60.5	7
36	59.24		58.0		53.09		61.2	
Mittl. Ort	53.59		39.0		47.30		41.9	
	49)				50)			

1902	δ Arietis. 4^m.1.				48 H. Cephei. 6^m.1.			
	AR.		Decl. +		AR.		Decl. +	
	$3^h\ 6^m$		19° 21′		$3^h\ 7^m$		77° 22′	
	s		″		s		″	
Jan. 0	3.18	9	24.2	2	58.79	63	43.5	18
10	3.09	12	24.0	4	58.16	76	45.3	14
20	2.97	15	23.6	4	57.40	84	46.7	8
30	2.82	16	23.2	5	56.56	90	47.5	2
Febr. 9	2.66	17	22.7	6	55.66	91	47.7	— 4
19	2.49	16	22.1	7	54.75	89	47.3	10
März 1	2.33	16	21.4	6	53.86	82	46.3	15
11	2.17	14	20.8	7	53.04	72	44.8	20
21	2.03	11	20.1	5	52.32	59	42.8	24
31	1.92	7	19.6	5	51.73	42	40.4	26
April 10	1.85	3	19.1	4	51.31	25	37.8	28
20	1.82	— 2	18.7	2	51.06	6	35.0	28
30	1.84	7	18.5	1	51.00	— 13	32.2	29
Mai 10	1.91	12	18.4	— 2	51.13	36	29.3	29
20	2.03	17	18.6	5	51.49	52	26.4	25
30	2.20	20	19.1	6	52.01	67	23.9	22
Juni 9	2.40	24	19.7	8	52.68	81	21.7	18
19	2.64	27	20.5	9	53.49	93	19.9	14
29	2.91	29	21.4	12	54.42	103	18.5	10
Juli 9	3.20	31	22.6	13	55.45	109	17.5	4
19	3.51	32	23.9	13	56.54	113	17.1	1
29	3.83	31	25.2	13	57.67	115	17.0	— 5
Aug. 8	4.14	31	26.5	14	58.82	115	17.5	9
18	4.45	29	27.9	13	59.97	111	18.4	14
28	4.74	28	29.2	12	61 08	106	19.8	18
Sept. 7	5.02	26	30.4	12	62.14	100	21.6	21
17	5.28	23	31.6	10	63.14	91	23.7	25
27	5.51	21	32.6	8	64.05	81	26.2	27
Oct. 7	5.72	19	33.4	7	64.86	69	28.9	30
17	5.91	15	34.1	6	65.55	56	31.9	32
27	6.06	13	34.7	4	66.11	41	35.1	33
Nov. 6	6.19	9	35.1	3	66.52	25	38.4	33
16	6.28	6	35.4	2	66.77	8	41.7	32
26	6.34	3	35.6	1	66.85	— 8	44.9	31
Dec. 6	6.37	— 1	35.7	0	66.77	26	48.0	28
16	6.36	4	35.7	1	66.51	42	50.8	25
26	6.32	8	35.6	2	66.09	57	53.3	22
36	6.24		35.4		65.52		55.5	
Mittl. Ort	1.37		22.4		51.66		30.4	
	359)				360)			

1902	12 Eridani. 3m.3.				α Persei. 2m.0.				o Tauri. 3m.6.				2 H. Camelop. 4m.6.			
	AR.		Decl. −		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	3h 7m		29° 22′		3h 17m		49° 30′		3h 19m		8° 40′		3h 21m		59° 35′	
Jan. 0	55.84s	14	35.2″	16	22.07s	15	53.3″	10	34.00s	8	61.2″	6	11.12s	21	66.7″	13
10	55.70	16	36.8	12	21.92	19	54.3	6	33.92	11	60.6	7	10.91	26	68.0	10
20	55.54	18	38.0	8	21.73	23	54.9	2	33.81	14	59.9	6	10.65	31	69.0	5
30	55.36	19	38.8	4	21.50	25	55.1	— 1	33.67	15	59.3	5	10.34	35	69.5	1
Febr. 9	55.17	21	39.2	0	21.25	27	55.0	5	33.52	16	58.8	5	9.99	36	69.6	— 4
19	54.96	20	39.2	4	20.98	27	54.5	9	33.36	17	58.3	4	9.63	35	69.2	9
März 1	54.76	19	38.8	8	20.71	25	53.6	12	33.19	16	57.9	4	9.28	34	68.3	12
11	54.57	17	38.0	12	20.46	22	52.4	15	33.03	14	57.5	2	8.94	30	67.1	16
21	54.40	14	36.8	15	20.24	18	50.9	16	32.89	11	57.3	1	8.64	25	65.5	20
31	54.26	11	35.3	19	20.06	13	49.3	18	32.78	8	57.2	0	8.39	18	63.5	21
April 10	54.15	6	33.4	22	19.93	7	47.5	19	32.70	5	57.2	2	8.21	10	61.4	22
20	54.09	2	31.2	25	19.86	0	45.6	18	32.65	0	57.4	4	8.11	2	59.2	23
30	54.07	— 3	28.7	26	19.86	7	43.8	18	32.65	5	57.8	6	8.09	— 7	56.9	22
Mai 10	54.10	10	26.1	30	19.93	16	42.0	17	32.70	11	58.4	9	8.16	17	54.7	23
20	[10] 54.20	13	23.1	29	[13] 20.09	21	40.3	13	[13] 32.81	14	59.3	9	[13] 8.33	24	52.4	18
30	54.33	18	20.2	28	20.30	26	39.0	10	32.95	18	60.2	12	8.57	32	50.6	16
Juni 9	54.51	22	17.4	28	20.56	32	38.0	8	33.13	22	61.4	12	8.89	38	49.0	12
19	54.73	25	14.6	27	20.88	36	37.2	5	33.35	25	62.6	14	9.27	44	47.8	9
29	54.98	28	11.9	25	21.24	39	36.7	1	33.60	27	64.0	15	9.71	47	46.9	5
Juli 9	55.26	30	9.4	22	21.63	42	36.6	— 3	33.87	28	65.5	15	10.18	51	46.4	1
19	55.56	31	7.2	18	22.05	43	36.9	5	34.15	30	67.0	14	10.69	53	46.3	— 2
29	55.87	31	5.4	15	22.48	43	37.4	8	34.45	30	68.4	14	11.22	54	46.5	6
Aug. 8	56.18	32	3.9	10	22.91	43	38.2	11	34.75	29	69.8	13	11.76	53	47.1	10
18	56.50	30	2.9	5	23.34	41	39.3	14	35.04	29	71.1	11	12.29	52	48.1	12
28	56.80	29	2.4	1	23.75	40	40.7	16	35.33	27	72.2	10	12.81	50	49.3	16
Sept. 7	57.09	27	2.3	— 5	24.15	37	42.3	17	35.60	25	73.2	7	13.31	47	50.9	19
17	57.36	23	2.8	9	24.52	35	44.0	19	35.85	23	73.9	5	13.78	44	52.8	21
27	57.59	21	3.7	13	24.87	31	45.9	20	36.08	21	74.4	3	14.22	39	54.9	22
Oct. 7	57.80	17	5.0	17	25.18	27	47.9	21	36.29	19	74.7	1	14.61	35	57.1	24
17	57.97	14	6.7	21	25.45	23	50.0	21	36.48	16	74.8	— 1	14.96	30	59.5	25
27	58.11	10	8.8	23	25.68	19	52.1	21	36.64	13	74.7	2	15.26	23	62.0	26
Nov. 6	58.21	6	11.1	24	25.87	14	54.2	21	36.77	10	74.5	4	15.49	17	64.6	25
16	58.27	3	13.5	24	26.01	9	56.3	19	36.87	7	74.1	5	15.66	11	67.1	25
26	58.30	— 2	15.9	24	26.10	4	58.2	19	36.94	3	73.6	5	15.77	4	69.6	24
Dec. 6	58.28	5	18.3	22	26.14	— 2	60.1	16	36.97	0	73.1	6	15.81	— 4	72.0	21
16	58.23	8	20.5	20	26.12	7	61.7	14	36.97	3	72.5	7	15.77	11	74.1	19
26	58.15	12	22.5	17	26.05	12	63.1	12	36.94	7	71.8	6	15.66	17	76.0	16
36	58.03		24.2		25.93		64.3		36.87		71.2		15.49		77.6	
Mittl. Ort	54.48		23.9		19.33		45.1		32.29		63.0		7.66		57.0	
	549)				52)				53)				361)			

1902	*f* Tauri. $4^m.0$ AR.		Decl. +		ε Eridani. $3^m.0$ AR.		Decl. −	
	$3^h\ 25^m$		12° 35′		$3^h\ 28^m$		9° 47′	
Jan. 0	29.41	7	62.7	5	20.29	9	31.2	13
10	29.34	11	62.2	5	20.20	11	32.5	11
20	29.23	13	61.7	5	20.09	15	33.6	8
30	29.10	15	61.2	5	19.94	16	34.4	6
Febr. 9	28.95	17	60.7	5	19.78	17	35.0	4
19	28.78	17	60.2	5	19.61	17	35.4	1
März 1	28.61	16	59.7	5	19.44	17	35.5	1
11	28.45	15	59.2	3	19.27	16	35.4	4
21	28.30	12	58.9	3	19.11	13	35.0	7
31	28.18	9	58.6	1	18.98	10	34.3	9
April 10	28.09	4	58.5	0	18.88	6	33.4	11
20	28.05	0	58.5	1	18.82	2	32.3	14
30	28.05	4	58.6	4	18.80	3	30.9	16
Mai 10	28.09	10	59.0	6	18.83	8	29.3	20
20	15 28.19	14	59.6	7	15 18.91	12	27.3	20
30	28.33	18	60.3	9	19.03	16	25.3	20
Juni 9	28.51	22	61.2	11	19.19	19	23.3	22
19	28.73	25	62.3	11	19.38	23	21.1	21
29	28.98	27	63.4	13	19.61	26	19.0	20
Juli 9	29.25	29	64.7	14	19.87	27	17.0	19
19	29.54	30	66.1	13	20.14	29	15.1	18
29	29.84	30	67.4	14	20.43	28	13.3	15
Aug. 8	30.14	30	68.8	12	20.71	29	11.8	12
18	30.44	29	70.0	12	21.00	28	10.6	9
28	30.73	27	71.2	10	21.28	27	9.7	6
Sept. 7	31.00	27	72.2	8	21.55	25	9.1	2
17	31.27	24	73.0	7	21.80	23	8.9	2
27	31.51	22	73.7	4	22.03	21	9.1	5
Oct. 7	31.73	19	74.1	3	22.24	18	9.6	9
17	31.92	16	74.4	1	22.42	16	10.5	11
27	32.08	14	74.5	0	22.58	12	11.6	13
Nov. 6	32.22	11	74.5	1	22.70	10	12.9	15
16	32.33	8	74.4	3	22.80	6	14.4	16
26	32.41	5	74.1	3	22.86	3	16.0	16
Dec. 6	32.46	0	73.8	4	22.89	0	17.6	16
16	32.46	2	73.4	4	22.89	4	19.2	15
26	32.44	7	73.0	5	22.85	8	20.7	13
36	32.37		72.5		22.77		22.0	
Mittl. Ort	27.63		63.7		18.72		24.3	
			55)				56)	

1902	δ Persei. $3^m.1$ AR.		Decl. +		ν Persei. $4^m.0$ AR.		Decl. +	
	$3^h\ 35^m$		47° 28′		$3^h\ 38^m$		42° 16′	
Jan. 0	59.35	12	34.1	10	34.55	10	13.7	8
10	59.23	17	35.1	7	34.45	15	14.5	5
20	59.06	21	35.8	3	34.30	18	15.0	2
30	58.85	24	36.1	0	34.12	21	15.2	0
Febr. 9	58.61	25	36.1	3	33.91	23	15.2	4
19	58.36	26	35.8	7	33.68	23	14.8	6
März 1	58.10	25	35.1	10	33.45	23	14.2	9
11	57.85	23	34.1	13	33.22	21	13.3	11
21	57.62	19	32.8	15	33.01	17	12.2	14
31	57.43	14	31.3	16	32.84	13	10.8	14
April 10	57.29	9	29.7	17	32.71	8	9.4	15
20	57.20	2	28.0	17	32.63	2	7.9	14
30	57.18	4	26.3	16	32.61	4	6.5	14
Mai 10	57.22	12	24.7	17	32.65	11	5.1	14
20	17 57.34	18	23.0	13	18 32.76	17	3.7	10
30	57.52	24	21.7	11	32.93	21	2.7	8
Juni 9	57.76	29	20.6	8	33.14	27	1.9	5
19	58.05	33	19.8	5	33.41	30	1.4	3
29	58.38	37	19.3	2	33.71	34	1.1	0
Juli 9	58.75	39	19.1	1	34.05	36	1.1	2
19	59.14	41	19.2	4	34.41	38	1.3	5
29	59.55	42	19.6	7	34.79	39	1.8	7
Aug. 8	59.97	41	20.3	9	35.18	38	2.5	10
18	60.38	41	21.2	11	35.56	37	3.5	11
28	60.79	39	22.3	13	35.93	37	4.6	13
Sept. 7	61.18	38	23.6	16	36.30	35	5.9	14
17	61.56	35	25.2	16	36.65	32	7.3	15
27	61.91	32	26.8	18	36.97	30	8.8	16
Oct. 7	62.23	28	28.6	18	37.27	27	10.4	16
17	62.51	25	30.4	19	37.54	23	12.0	16
27	62.76	21	32.3	19	37.77	20	13.6	16
Nov. 6	62.97	16	34.2	19	37.97	16	15.2	16
16	63.13	12	36.1	19	38.13	11	16.8	16
26	63.25	7	38.0	17	38.24	7	18.4	14
Dec. 6	63.32	1	39.7	16	38.31	2	19.8	13
16	63.33	5	41.3	13	38.33	3	21.1	12
26	63.28	9	42.6	12	38.30	8	22.3	9
36	63.19		43.8		38.22		23.2	
Mittl. Ort	56.60		27.7		32.02		8.6	
			57)				59)	

1902	5 H. Camelop. 4^m.3.				η Tauri. 3^m.0.				τ^6 Eridani. 4^m.0.				ζ Persei. 3^m.0.			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. −		AR.		Decl. +	
	3^h 40^m		71° 1′		3^h 41^m		23° 48′		3^h 42^m		23° 32′		3^h 47^m		31° 35′	
Jan. 0	5.39^s	32	59.3″	20	41.43^s	7	9.3″	1	39.42^s	10	32.5″	18	60.41^s	7	36.4″	4
10	5.07	43	61.3	15	41.36	11	9.2	1	39.32	14	34.3	14	60.34	12	36.8	2
20	4.64	51	62.8	10	41.25	14	9.1	2	39.18	16	35.7	11	60.22	15	37.0	0
30	4.13	56	63.8	5	41.11	16	8.9	3	39.02	18	36.8	8	60.07	17	37.0	2
Febr. 9	3.57	59	64.3	0	40.95	18	8.6	5	38.84	19	37.6	3	59.90	19	36.8	4
19	2.98	59	64.3	6	40.77	18	8.1	5	38.65	20	37.9	0	59.71	20	36.4	5
März 1	2.39	57	63.7	11	40.59	18	7.6	6	38.45	20	37.9	4	59.51	20	35.9	7
11	1.82	53	62.6	16	40.41	17	7.0	7	38.25	18	37.5	7	59.31	18	35.2	8
21	1.29	44	61.0	19	40.24	14	6.3	6	38.07	16	36.8	11	59.13	16	34.4	9
31	0.85	35	59.1	23	40.10	10	5.7	7	37.91	12	35.7	14	58.97	12	33.5	10
April 10	0.50	24	56.8	25	40.00	7	5.0	6	37.79	9	34.3	17	58.85	7	32.5	9
20	0.26	11	54.3	26	39.93	1	4.4	4	37.70	5	32.6	20	58.78	3	31.6	9
30	0.15	— 3	51.7	27	39.92	— 3	4.0	4	37.65	0	30.6	23	58.75	— 3	30.7	8
Mai 10	0.18	17	49.0	28	39.95	9	3.6	2	37.65	6	28.3	26	58.78	8	29.9	7
20	[18] 0.35	28	46.2	24	[19] 40.04	14	3.4	— 1	[19] 37.71	10	25.7	26	58.86	15	29.2	5
30	0.63	41	43.8	22	40.18	18	3.5	2	37.81	14	23.1	26	[20] 59.01	18	28.7	2
Juni 9	1.04	51	41.6	19	40.36	22	3.7	4	37.95	18	20.5	26	59.19	23	28.5	0
19	1.55	60	39.7	15	40.58	25	4.1	5	38.13	22	17.9	25	59.42	27	28.5	1
29	2.15	67	38.2	11	40.83	28	4.6	8	38.35	25	15.4	25	59.69	29	28.6	3
Juli 9	2.82	73	37.1	8	41.11	31	5.4	9	38.60	28	12.9	22	59.98	32	28.9	6
19	3.55	77	36.3	3	41.42	31	6.3	10	38.88	29	10.7	19	60.30	33	29.5	7
29	4.32	80	36.0	— 2	41.73	32	7.3	10	39.17	29	8.8	16	60.63	34	30.2	9
Aug. 8	5.12	80	36.2	5	42.05	32	8.3	11	39.46	29	7.2	12	60.97	34	31.1	9
18	5.92	80	36.7	9	42.37	31	9.4	11	39.75	30	6.0	8	61.31	34	32.0	11
28	6.72	77	37.6	14	42.68	30	10.5	11	40.05	29	5.2	3	61.65	32	33.1	11
Sept. 7	7.49	74	39.0	17	42.98	28	11.6	10	40.34	28	4.9	— 1	61.97	31	34.2	11
17	8.23	70	40.7	20	43.26	27	12.6	10	40.62	25	5.0	6	62.28	29	35.3	12
27	8.93	63	42.7	23	43.53	25	13.6	9	40.87	23	5.6	11	62.57	27	36.5	11
Oct. 7	9.56	56	45.0	25	43.78	22	14.5	7	41.10	20	6.7	14	62.84	24	37.6	11
17	10.12	49	47.5	27	44.00	20	15.2	7	41.30	17	8.1	18	63.08	22	38.7	10
27	10.61	40	50.2	29	44.20	17	15.9	6	41.47	13	9.9	21	63.30	19	39.7	10
Nov. 6	11.01	29	53.1	30	44.37	13	16.5	5	41.60	11	12.0	22	63.49	15	40.7	10
16	11.30	18	56.1	29	44.50	10	17.0	4	41.71	7	14.2	23	63.64	11	41.7	8
26	11.48	7	59.0	29	44.60	7	17.4	3	41.78	3	16.5	24	63.75	8	42.5	8
Dec. 6	11.55	— 5	61.9	27	44.67	2	17.7	2	41.81	— 1	18.9	22	63.83	3	43.3	7
16	11.50	17	64.6	25	44.69	— 1	17.9	2	41.80	5	21.1	21	63.86	— 1	44.0	6
26	11.33	28	67.1	22	44.68	6	18.1	0	41.75	8	23.2	19	63.85	5	44.6	4
36	11.05		69.3		44.62		18.1		41.67		25.1		63.80		45.0	
Mittl. Ort	0.07		49.9		39.39		8.4		37.85		22.2		58.17		34.2	
	364)				61)				551)				63)			

1902	9 H. Camelop. 6ᵐ.0. AR.		Decl. +		ε Persei. 3ᵐ.3. AR.		Decl. +		ξ Persei. 4ᵐ.0. AR.		Decl. +		γ Eridani. 3ᵐ.0. AR.		Decl. —	
	$3^h\,48^m$		60° 49′		$3^h\,51^m$		39° 43′		$3^h\,52^m$		35° 30′		$3^h\,53^m$		13° 46′	
Jan. 0	50.30	17	27.4	16	18.96	9	40.8	7	38.58	7	36.3	5	29.01	7	82.5	15
10	50.13	25	29.0	13	18.87	13	41.5	5	38.51	12	36.8	4	28.94	11	84.0	13
20	49.88	30	30.3	8	18.74	16	42.0	3	38.39	15	37.2	1	28.83	14	85.3	10
30	49.58	35	31.1	5	18.58	20	42.3	0	38.24	19	37.3	0	28.69	16	86.3	8
Febr. 9	49.23	37	31.6	— 1	18.38	22	42.3	3	38.05	20	37.3	3	28.53	18	87.1	4
19	48.86	38	31.5	5	18.16	23	42.0	5	37.85	21	37.0	5	28.35	18	87.5	2
März 1	48.48	37	31.0	10	17.93	22	41.5	8	37.64	21	36.5	7	28.17	18	87.7	— 1
11	48.11	34	30.0	14	17.71	20	40.7	10	37.43	19	35.8	9	27.99	17	87.6	4
21	47.77	30	28.6	17	17.51	18	39.7	11	37.24	17	34.9	10	27.82	15	87.2	7
31	47.47	23	26.9	19	17.33	14	38.6	13	37.07	13	33.9	11	27.67	12	86.5	10
April 10	47.24	15	25.0	22	17.19	8	37.3	13	36.94	8	32.8	12	27.55	9	85.5	13
20	47.09	8	22.8	22	17.11	4	36.0	13	36.86	4	31.6	11	27.46	4	84.2	15
30	47.01	— 2	20.6	23	17.07	— 2	34.7	12	36.82	— 3	30.5	10	27.42	0	82.7	17
Mai 10	47.03	11	18.3	22	17.09	8	33.5	11	36.85	8	29.5	8	27.42	5	81.0	19
20	47.14	21	16.1	22	17.17	16	32.4	10	36.93	15	28.7	8	27.47	10	79.1	23
30	[20] 47.35	28	13.9	18	[21] 17.33	20	31.4	8	[21] 37.08	18	27.9	5	[22] 27.57	14	76.8	22
Juni 9	47.63	35	12.1	15	17.53	25	30.6	5	37.26	24	27.4	3	27.71	18	74.6	23
19	47.98	42	10.6	12	17.78	28	30.1	3	37.50	27	27.1	1	27.89	21	72.3	22
29	48.40	46	9.4	9	18.06	32	29.8	0	37.77	30	27.0	— 2	28.10	24	70.1	22
Juli 9	48.86	51	8.5	5	18.38	35	29.8	2	38.07	33	27.2	4	28.34	26	67.9	20
19	49.37	54	8.0	1	18.73	36	30.0	5	38.40	34	27.6	6	28.60	28	65.9	18
29	49.91	55	7.9	— 2	19.09	37	30.5	6	38.74	35	28.2	7	28.88	28	64.1	16
Aug. 8	50.46	56	8.1	6	19.46	37	31.1	8	39.09	36	28.9	8	29.16	29	62.5	13
18	51.02	55	8.7	8	19.83	36	31.9	10	39.45	34	29.7	10	29.45	29	61.2	9
28	51.57	53	9.5	12	20.19	36	32.9	11	39.79	34	30.7	11	29.74	28	60.3	5
Sept. 7	52.10	52	10.7	16	20.55	34	34.0	13	40.13	33	31.8	12	30.02	27	59.8	1
17	52.62	48	12.3	17	20.89	32	35.3	13	40.46	30	33.0	12	30.29	25	59.7	— 2
27	53.10	45	14.0	20	21.21	30	36.6	14	40.76	29	34.2	12	30.54	22	59.9	6
Oct. 7	53.55	41	16.0	22	21.51	27	38.0	14	41.05	26	35.4	12	30.76	21	60.5	11
17	53.96	35	18.2	23	21.78	24	39.4	14	41.31	23	36.6	12	30.97	18	61.6	14
27	54.31	30	20.5	24	22.02	21	40.8	14	41.54	20	37.8	12	31.15	15	63.0	15
Nov. 6	54.61	24	22.9	25	22.23	18	42.2	14	41.74	16	39.0	12	31.30	12	64.5	18
16	54.85	16	25.4	26	22.41	13	43.6	14	41.90	13	40.2	11	31.42	8	66.3	19
26	55.01	9	28.0	24	22.54	8	45.0	13	42.03	8	41.3	10	31.50	5	68.2	19
Dec. 6	55.10	2	30.4	23	22.62	4	46.3	12	42.11	4	42.3	9	31.55	2	70.1	18
16	55.12	— 7	32.7	21	22.66	— 2	47.5	10	42.15	— 1	43.2	8	31.57	— 2	71.9	18
26	55.05	14	34.8	18	22.64	6	48.5	8	42.14	5	44.0	7	31.55	6	73.7	16
36	54.91		36.6		22.58		49.3		42.09		44.7		31.49		75.3	
Mittl. Ort	46.54		20.0		16.46		37.2		36.22		33.6		27.36		74.1	
	365)				64)				65)				552)			

1902	λ Tauri. 3.4...4ᵐ.2. AR.		Decl. +		ν Tauri. 4ᵐ.0. AR.		Decl. +		c Persei. 4ᵐ.0. AR.		Decl. +		o¹ Eridani. 4ᵐ.4. AR.		Decl. −	
	$3^h\ 55^m$		12° 12′		$3^h\ 57^m$		5° 42′		$4^h\ 1^m$		47° 26′		$4^h\ 7^m$		7° 5′	
Jan. 0	16.86	6	46.2	5	58.37	6	58.7	8	35.46	9	67.8	12	6.61	5	41.9	13
10	16.80	9	45.7	5	58.31	9	57.9	7	35.37	15	69.0	9	6.56	10	43.2	12
20	16.71	13	45.2	5	58.22	12	57.2	7	35.22	19	69.9	6	6.46	12	44.4	10
30	16.58	15	44.7	4	58.10	15	56.5	5	35.03	23	70.5	2	6.34	15	45.4	7
Febr. 9	16.43	16	44.3	4	57.95	16	56.0	5	34.80	25	70.7	—1	6.19	17	46.1	5
19	16.27	17	43.9	4	57.79	18	55.5	4	34.55	27	70.6	4	6.02	18	46.6	3
März 1	16.10	18	43.5	4	57.61	17	55.1	2	34.28	26	70.2	8	5.84	18	46.9	1
11	15.92	16	43.1	3	57.44	16	54.9	1	34.02	25	69.4	10	5.66	17	47.0	—2
21	15.76	14	42.8	3	57.28	14	54.8	0	33.77	21	68.4	13	5.49	15	46.8	4
31	15.62	11	42.5	1	57.14	11	54.8	1	33.56	17	67.1	15	5.34	13	46.4	7
April 10	15.51	7	42.4	0	57.03	8	54.9	4	33.39	11	65.6	16	5.21	9	45.7	9
20	15.44	3	42.4	2	56.95	3	55.3	5	33.28	6	64.0	16	5.12	5	44.8	12
30	15.41	—1	42.6	3	56.92	—1	55.8	6	33.22	—1	62.4	16	5.07	0	43.6	14
Mai 10	15.42	6	42.9	5	56.93	5	56.4	9	33.23	7	60.8	16	5.07	4	42.2	15
20	15.48	12	43.4	7	56.98	12	57.3	11	33.30	16	59.2	15	5.11	9	40.7	19
30	[22] 15.60	16	44.1	8	[23] 57.10	15	58.4	12	[24] 33.46	20	57.7	12	[25] 5.20	13	38.8	19
Juni 9	15.76	19	44.9	10	57.25	18	59.6	13	33.66	26	56.5	10	5.33	17	36.9	19
19	15.95	23	45.9	11	57.43	22	60.9	14	33.92	31	55.5	7	5.50	20	35.0	19
29	16.18	25	47.0	12	57.65	24	62.3	14	34.23	34	54.8	5	5.70	23	33.1	19
Juli 9	16.43	28	48.2	12	57.89	27	63.7	15	34.57	38	54.3	2	5.93	26	31.2	19
19	16.71	29	49.4	12	58.16	28	65.2	14	34.95	40	54.1	—1	6.19	27	29.3	17
29	17.00	29	50.6	12	58.44	29	66.6	13	35.35	41	54.2	4	6.46	28	27.6	15
Aug. 8	17.29	30	51.8	12	58.73	29	67.9	12	35.76	42	54.6	6	6.74	29	26.1	13
18	17.59	30	53.0	10	59.02	29	69.1	9	36.18	41	55.2	8	7.03	28	24.8	9
28	17.89	28	54.0	8	59.31	28	70.0	8	36.59	40	56.0	11	7.31	28	23.9	7
Sept. 7	18.17	27	54.8	7	59.59	27	70.8	6	36.99	39	57.1	12	7.59	27	23.2	3
17	18.44	26	55.5	5	59.86	25	71.4	3	37.38	37	58.3	14	7.86	25	22.9	—1
27	18.70	24	56.0	4	60.11	23	71.7	1	37.75	35	59.7	15	8.11	24	23.0	4
Oct. 7	18.94	22	56.4	2	60.34	22	71.8	—2	38.10	32	61.2	16	8.35	21	23.4	7
17	19.16	19	56.6	0	60.56	19	71.6	3	38.42	28	62.8	17	8.56	19	24.1	10
27	19.35	17	56.6	2	60.75	16	71.3	5	38.70	25	64.5	17	8.75	17	25.1	13
Nov. 6	19.52	14	56.4	2	60.91	14	70.8	7	38.95	20	66.2	18	8.92	13	26.4	14
16	19.66	11	56.2	4	61.05	10	70.1	8	39.15	15	68.0	18	9.05	11	27.8	15
26	19.77	7	55.8	4	61.15	7	69.3	8	39.30	11	69.8	17	9.16	7	29.3	16
Dec 6	19.84	3	55.4	5	61.22	4	68.5	8	39.41	5	71.5	16	9.23	3	30.9	16
16	19.87	0	54.9	5	61.26	0	67.7	9	39.46	—1	73.1	15	9.26	0	32.5	15
26	19.87	4	54.4	5	61.26	5	66.8	7	39.45	7	74.6	13	9.26	4	34.0	14
36	19.83		53.9		61.21		66.1		39.38		75.9		9.22		35.4	
Mittl. Ort	14.96		48.8		56.54		62.9		32.60		63.7		4.87		34.6	
	66)				67)				69)				366)			

1902	δ Tauri. $4^m.0$. AR.	Δ	Decl. +	Δ	ε Tauri. $3^m.6$. AR.	Δ	Decl. +	Δ	α Tauri. 1^m. AR.	Δ	Decl. +	Δ	ν Eridani. $3^m.3$. AR.	Δ	Decl. —	Δ
	$4^h\ 17^m$		17° 18′		$4^h\ 22^m$		18° 57′		$4^h\ 30^m$		16° 18′		$4^h\ 31^m$		3° 33′	
Jan. 0	18.94		43.7		55.65		45.1		19.80		41.3		27.08		16.5	
10	18.90	4	43.4	3	55.62	3	44.9	2	19.77	3	40.9	4	27.05	3	17.8	13
20	18.82	8	43.1	3	55.54	8	44.7	2	19.70	7	40.6	3	26.97	8	18.9	11
30	18.71	11	42.8	3	55.43	11	44.4	3	19.60	10	40.3	3	26.85	12	19.9	10
Febr. 9	18.56	15	42.5	3	55.28	15	44.2	2	19.46	14	40.0	3	26.71	14	20.6	7
19	18.39	17	42.1	4	55.12	16	43.9	3	19.29	17	39.7	3	26.55	16	21.2	6
März 1	18.21	18	41.7	4	54.94	18	43.5	4	19.11	18	39.3	4	26.37	18	21.6	4
11	18.03	18	41.4	3	54.75	19	43.1	4	18.93	18	39.0	3	26.19	18	21.7	1
21	17.86	17	41.0	4	54.57	18	42.8	3	18.75	18	38.7	3	26.01	18	21.7	0
31	17.70	16	40.7	3	54.41	16	42.4	4	18.59	16	38.4	3	25.85	16	21.4	3
April 10	17.57	13	40.4	3	54.28	13	42.0	4	18.45	14	38.2	2	25.72	13	20.9	5
20	17.48	9	40.1	3	54.18	10	41.7	3	18.35	10	38.0	2	25.62	10	20.2	7
30	17.43	5	40.0	1	54.13	5	41.5	2	18.29	6	37.9	1	25.55	7	19.3	9
Mai 10	17.43	0	40.0	0	54.12	1	41.4	1	18.28	1	38.0	1	25.52	3	18.3	10
20	17.48	5	40.2	2	54.16	4	41.5	1	18.31	3	38.2	2	25.54	2	17.0	13
30	[28] 17.58	10	40.5	3	[29] 54.26	10	41.7	2	18.39	8	38.5	3	25.60	6	15.6	14
Juni 9	17.72	14	40.9	4	54.40	14	42.0	3	[31] 18.52	13	39.0	5	[31] 25.72	12	13.8	18
19	17.90	18	41.5	6	54.57	17	42.5	5	18.69	17	39.6	6	25.87	15	12.1	17
29	18.12	22	42.3	8	54.79	22	43.1	6	18.90	21	40.3	7	26.05	18	10.3	18
Juli 9	18.36	24	43.1	8	55.03	24	43.9	8	19.13	23	41.1	8	26.27	22	8.6	17
19	18.63	27	44.0	9	55.30	27	44.7	8	19.39	26	42.0	9	26.51	24	6.9	17
29	18.92	29	45.0	10	55.59	29	45.6	9	19.67	28	42.9	9	26.77	26	5.3	16
Aug. 8	19.22	30	46.0	10	55.89	30	46.4	8	19.96	29	43.8	9	27.04	27	3.9	14
18	19.52	30	46.9	9	56.19	30	47.3	9	20.26	30	44.7	9	27.32	28	2.7	12
28	19.82	30	47.8	9	56.50	31	48.2	9	20.56	30	45.5	8	27.61	29	1.7	10
Sept. 7	20.12	30	48.6	8	56.80	30	48.9	7	20.86	30	46.3	8	27.89	28	1.1	6
17	20.40	28	49.3	7	57.09	29	49.6	7	21.15	29	46.9	6	28.16	27	0.7	4
27	20.68	28	49.8	5	57.37	28	50.2	6	21.43	28	47.3	4	28.43	27	0.7	0
Oct. 7	20.94	26	50.3	5	57.64	27	50.7	5	21.69	26	47.6	3	28.68	25	1.0	3
17	21.18	24	50.6	3	57.89	25	51.0	3	21.94	25	47.8	2	28.91	23	1.6	6
27	21.40	22	50.7	1	58.11	22	51.2	2	22.17	23	47.9	1	29.12	21	2.5	9
Nov. 6	21.59	19	50.8	1	58.31	20	51.3	1	22.37	20	47.8	1	29.31	19	3.6	11
16	21.76	17	50.7	1	58.48	17	51.4	1	22.55	18	47.7	1	29.47	16	4.8	12
26	21.89	13	50.6	1	58.62	14	51.4	0	22.70	15	47.5	2	29.60	13	6.2	14
Dec. 6	21.99	10	50.5	1	58.73	11	51.3	1	22.81	11	47.2	3	29.70	10	7.7	15
16	22.05	6	50.3	2	58.79	6	51.2	1	22.88	7	46.9	3	29.76	6	9.1	14
26	22.07	2	50.1	2	58.82	3	51.0	2	22.91	3	46.6	3	29.78	2	10.5	14
36	22.05	2	49.8	3	58.81	1	50.9	1	22.90	1	46.3	3	29.76	2	11.8	13
Mittl. Ort	16.89		46.3		53.56		47.7		17.73		44.8		25.22		9.3	
	71)				72)				73)				74)			

1902	53 Eridani. 4m.0. AR.		Decl. −		Gr. 848. 6m.1. AR.		Decl. +	
	4h 33m		14° 29′		4h 35m		75° 45′	
Jan. 0	43.22	5	53.6	16	45.63	28	52.2	25
10	43.17	9	55.2	16	45.35	44	54.7	21
20	43.08	12	56.8	13	44.91	58	56.8	18
30	42.96	15	58.1	10	44.33	68	58.6	13
Febr. 9	42.81	17	59.1	6	43.65	77	59.9	7
19	42.64	19	59.7	4	42.88	81	60.6	2
März 1	42.45	20	60.1	1	42.07	82	60.8	— 3
11	42.25	19	60.2	— 3	41.25	78	60.5	10
21	42.06	17	59.9	5	40.47	72	59.5	14
31	41.89	15	59.4	8	39.75	63	58.1	18
April 10	41.74	12	58.6	11	39.12	50	56.3	22
20	41.62	8	57.5	14	38.62	35	54.1	25
30	41.54	3	56.1	17	38.27	20	51.6	27
Mai 10	41.51	0	54.4	18	38.07	3	48.9	27
20	41.51	6	52.6	20	38.04	— 14	46.2	28
30	41.57	11	50.6	23	38.18	34	43.4	29
Juni 9	[1] 41.68	14	48.3	22	[1] 38.52	47	40.5	24
19	41.82	17	46.1	23	38.99	60	38.1	22
29	41.99	21	43.8	21	39.59	73	35.9	19
Juli 9	42.20	24	41.7	21	40.32	84	34.0	16
19	42.44	26	39.6	19	41.16	92	32.4	12
29	42.70	27	37.7	16	42.08	98	31.2	8
Aug. 8	42.97	28	36.1	13	43.06	103	30.4	4
18	43.25	29	34.8	10	44.09	106	30.0	— 1
28	43.54	28	33.8	7	45.15	106	30.1	4
Sept. 7	43.82	28	33.1	2	46.21	104	30.5	9
17	44.10	27	32.9	— 2	47.25	101	31.4	12
27	44.37	25	33.1	6	48.26	97	32.6	17
Oct. 7	44.62	24	33.7	11	49.23	90	34.3	19
17	44.86	21	34.8	13	50.13	81	36.2	23
27	45.07	18	36.1	16	50.94	71	38.5	26
Nov. 6	45.25	16	37.7	19	51.65	59	41.1	27
16	45.41	13	39.6	20	52.24	44	43.8	29
26	45.54	9	41.6	20	52.68	30	46.7	30
Dec. 6	45.63	5	43.6	21	52.98	13	49.7	30
16	45.68	1	45.7	20	53.11	— 4	52.7	28
26	45.69	— 3	47.7	18	53.07	20	55.5	27
36	45.66		49.5		52.87		58.2	
Mittl. Ort	41.41		44.4		38.25		48.0	
	553)				369)			

1902	τ Tauri. 4m.3. AR.		Decl. +		4 Camelop. 5m.8. AR.		Decl. +	
	4h 36m		22° 46′		4h 39m		56° 34′	
Jan. 0	23.88	3	6.4	0	53.72	7	61.9	17
10	23.85	7	6.4	0	53.65	15	63.6	15
20	23.78	11	6.4	1	53.50	21	65.1	12
30	23.67	14	6.3	1	53.29	27	66.3	9
Febr. 9	23.53	17	6.2	2	53.02	31	67.2	4
19	23.36	19	6.0	3	52.71	33	67.6	0
März 1	23.17	19	5.7	4	52.38	34	67.6	3
11	22.98	18	5.3	4	52.04	33	67.3	8
21	22.80	17	4.9	4	51.71	30	66.5	11
31	22.63	15	4.5	4	51.41	27	65.4	15
April 10	22.48	11	4.1	5	51.14	20	63.9	17
20	22.37	6	3.6	3	50.94	13	62.2	18
30	22.31	2	3.3	3	50.81	6	60.4	20
Mai 10	22.29	— 2	3.0	2	50.75	— 1	58.4	20
20	22.31	8	2.8	1	50.76	9	56.4	19
30	22.39	13	2.7	— 1	50.85	19	54.5	20
Juni 9	[1] 22.52	17	2.8	2	51.04	25	52.5	17
19	22.69	21	3.0	3	51.29	31	50.8	14
29	22.90	24	3.3	5	51.60	36	49.4	12
Juli 9	23.14	27	3.8	6	51.96	41	48.2	10
19	23.41	29	4.4	7	52.37	45	47.2	6
29	23.70	30	5.1	7	52.82	48	46.6	4
Aug. 8	24.00	31	5.8	7	53.30	49	46.2	0
18	24.31	31	6.5	7	53.79	50	46.2	2
28	24.62	31	7.2	7	54.29	49	46.4	5
Sept. 7	24.93	30	7.9	6	54.78	49	46.9	8
17	25.23	30	8.5	6	55.27	48	47.7	11
27	25.53	28	9.1	5	55.75	46	48.8	12
Oct. 7	25.81	26	9.6	4	56.21	43	50.0	15
17	26.07	24	10.0	3	56.64	39	51.5	17
27	26.31	22	10.3	2	57.03	36	53.2	19
Nov. 6	26.53	19	10.5	2	57.39	30	55.1	19
16	26.72	16	10.7	2	57.69	24	57.0	21
26	26.88	12	10.9	1	57.93	19	59.1	21
Dec. 6	27.00	8	11.0	1	58.12	11	61.2	21
16	27.08	4	11.1	1	58.23	4	63.3	20
26	27.12	0	11.2	1	58.27	— 4	65.3	19
36	27.12		11.3		58.23		67.2	
Mittl. Ort	21.68		9.1		50.13		59.9	
	370)				371)			

1902	9 Camelop. $4^m.3$.				π^5 Orionis. $4^m.0$.				ι Aurigae. $3^m.0$.				10 Camelop. $4^m.0$.			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	$4^h\ 44^m$		66° 10′		$4^h\ 49^m$		2° 16′		$4^h\ 50^m$		33° 0′		$4^h\ 54^m$		60° 17′	
Jan. 0	22.87	13	38.0	22	10.72	2	42.2	10	39.11	2	38.4	6	45.89	6	58.3	19
10	22.74	22	40.2	19	10.70	6	41.2	10	39.09	7	39.0	5	45.83	15	60.2	18
20	22.52	30	42.1	15	10.64	10	40.2	8	39.02	11	39.5	4	45.68	22	62.0	15
30	22.22	38	43.6	12	10.54	13	39.4	6	38.91	15	39.9	2	45.46	29	63.5	11
Febr. 9	21.84	43	44.8	7	10.41	16	38.8	5	38.76	19	40.1	1	45.17	34	64.6	6
19	21.41	48	45.5	2	10.25	17	38.3	4	38.57	20	40.2	— 1	44.83	37	65.2	3
März 1	20.93	48	45.7	— 3	10.08	18	37.9	3	38.37	21	40.1	3	44.46	38	65.5	— 2
11	20.45	47	45.4	8	9.90	18	37.6	0	38.16	21	39.8	5	44.08	38	65.3	6
21	19.98	43	44.6	12	9.72	16	37.6	0	37.95	20	39.3	6	43.70	35	64.7	10
31	19.55	37	43.4	16	9.56	15	37.6	3	37.75	17	38.7	7	43.35	31	63.7	14
April 10	19.18	30	41.8	19	9.41	11	37.9	4	37.58	13	38.0	8	43.04	25	62.3	17
20	18.88	22	39.9	22	9.30	8	38.3	6	37.45	9	37.2	8	42.79	18	60.6	19
30	18.66	11	37.7	23	9.22	4	38.9	8	37.36	4	36.4	8	42.61	11	58.7	20
Mai 10	18.55	1	35.4	24	9.18	— 1	39.7	9	37.32	— 2	35.6	8	42.50	1	56.7	22
20	18.54	— 9	33.0	24	9.19	5	40.6	11	37.34	6	34.8	7	42.49	— 7	54.5	21
30	18.63	22	30.6	25	9.24	11	41.7	13	37.40	14	34.1	6	42.56	18	52.4	22
Juni 9	[3] 18.85	30	28.1	21	[4] 9.35	14	43.0	14	[5] 37.54	17	33.5	5	[6] 42.74	24	50.2	20
19	19.15	39	26.0	19	9.49	17	44.4	14	37.71	21	33.0	3	42.98	31	48.2	17
29	19.54	46	24.1	17	9.66	21	45.8	14	37.92	25	32.7	1	43.29	37	46.5	15
Juli 9	20.00	53	22.4	13	9.87	23	47.2	14	38.17	28	32.6	0	43.66	43	45.0	12
19	20.53	57	21.1	10	10.10	25	48.6	14	38.45	31	32.6	2	44.09	48	43.8	9
29	21.10	62	20.1	7	10.35	27	50.0	12	38.76	32	32.8	2	44.57	51	42.9	7
Aug. 8	21.72	65	19.4	3	10.62	28	51.2	11	39.08	33	33.0	4	45.08	53	42.2	3
18	22.37	66	19.1	0	10.90	28	52.3	9	39.41	34	33.4	5	45.61	54	41.9	0
28	23.03	66	19.1	4	11.18	28	53.2	6	39.75	34	33.9	5	46.15	55	41.9	2
Sept. 7	23.69	66	19.5	8	11.46	28	53.8	4	40.09	34	34.4	6	46.70	55	42.1	6
17	24.35	64	20.3	10	11.74	27	54.2	2	40.43	33	35.0	6	47.25	54	42.7	9
27	24.99	62	21.3	14	12.01	26	54.4	— 2	40.76	31	35.6	7	47.79	51	43.6	12
Oct. 7	25.61	58	22.7	17	12.27	25	54.2	4	41.07	30	36.3	6	48.30	49	44.8	14
17	26.19	53	24.4	20	12.52	23	53.8	6	41.37	28	36.9	7	48.79	45	46.2	17
27	26.72	47	26.4	22	12.75	21	53.2	9	41.65	25	37.6	7	49.24	41	47.9	18
Nov. 6	27.19	40	28.6	23	12.96	18	52.3	10	41.90	22	38.3	7	49.65	36	49.7	20
16	27.59	32	30.9	25	13.14	15	51.3	11	42.12	19	39.0	7	50.01	30	51.7	22
26	27.91	23	33.4	25	13.29	12	50.2	12	42.31	15	39.7	8	50.31	22	53.9	22
Dec. 6	28.14	14	35.9	26	13.41	8	49.0	12	42.46	11	40.5	7	50.53	15	56.1	23
16	28.28	3	38.5	25	13.49	4	47.8	11	42.57	6	41.2	7	50.68	6	58.4	22
26	28.31	— 7	41.0	23	13.53	0	46.7	11	42.63	0	41.9	6	50.74	— 3	60.6	21
36	28.24		43.3		13.53		45.6		42.63		42.5		50.71		62.7	
Mittl. Ort	18.13		35.4		8.77		49.0		36.64		40.4		41.92		57.3	
	76)				78)				79)				80)			

1902	ε Aurig. 3.0...4^m.5. AR.		Decl. +		ι Tauri. 5^m.0. AR.		Decl. +		η Aurigae. 3^m.6. AR.		Decl. +		ε Leporis. 3^m.5. AR.		Decl. −	
	4h 54m		43° 40′		4h 57m		21° 26′		4h 59m		41° 5′		5h 1m		22° 29′	
Jan. 0	58.89	2	41.6	12	16.43	1	56.4	0	41.21	1	66.4	11	20.60	4	80.4	22
10	58.87	8	42.8	10	16.42	6	56.4	1	41.20	7	67.5	9	20.56	9	82.6	19
20	58.79	14	43.8	8	16.36	9	56.3	1	41.13	13	68.4	8	20.47	12	84.5	17
30	58.65	18	44.6	6	16.27	13	56.2	1	41.00	17	69.2	5	20.35	15	86.2	13
Febr. 9	58.47	21	45.2	3	16.14	16	56.1	1	40.83	20	69.7	3	20.20	18	87.5	9
19	58.26	24	45.5	1	15.98	18	56.0	2	40.63	23	70.0	1	20.02	21	88.4	5
März 1	58.02	26	45.6	— 3	15.80	20	55.8	3	40.40	24	70.1	— 2	19.81	21	88.9	2
11	57.76	25	45.3	5	15.60	19	55.5	3	40.16	24	69.9	5	19.60	21	89.1	— 2
21	57.51	23	44.8	7	15.41	17	55.2	3	39.92	22	69.4	7	19.39	20	88.9	5
31	57.28	20	44.1	10	15.24	16	54.9	3	39.70	20	68.7	9	19.19	17	88.4	9
April 10	57.08	16	43.1	12	15.08	12	54.6	3	39.50	15	67.8	10	19.02	15	87.5	13
20	56.92	11	41.9	12	14.96	8	54.3	3	39.35	11	66.8	12	18.87	12	86.2	15
30	56.81	5	40.7	13	14.88	4	54.0	2	39.24	6	65.6	12	18.75	7	84.7	18
Mai 10	56.76	0	39.4	14	14.84	0	53.8	2	39.18	0	64.4	12	18.68	3	82.9	21
20	56.76	7	38.0	13	14.84	6	53.6	0	39.18	6	63.2	12	18.65	— 2	80.8	23
30	56.83	14	36.7	13	14.90	11	53.6	1	39.24	14	62.0	11	18.67	7	78.5	27
Juni 9	56.97	18	35.4	11	15.01	15	53.7	2	39.38	17	60.9	9	18.74	11	75.8	25
19	57.15	24	34.3	9	15.16	19	53.9	3	39.55	22	60.0	8	18.85	15	73.3	25
29	57.39	27	33.4	7	15.35	22	54.2	4	39.77	27	59.2	6	19.00	19	70.8	24
Juli 9	57.66	32	32.7	5	15.57	25	54.6	5	40.04	30	58.6	5	19.19	22	68.4	24
19	57.98	34	32.2	3	15.82	27	55.1	6	40.34	32	58.1	2	19.41	24	66.0	21
29	58.32	36	31.9	1	16.09	29	55.7	6	40.66	35	57.9	1	19.65	27	63.9	19
Aug. 8	58.68	38	31.8	— 1	16.38	30	56.3	6	41.01	36	57.8	— 1	19.92	28	62.0	15
18	59.06	39	31.9	2	16.68	31	56.9	6	41.37	37	57.9	2	20.20	28	60.5	11
28	59.45	39	32.1	4	16.99	30	57.5	6	41.74	38	58.1	4	20.48	29	59.4	7
Sept. 7	59.84	38	32.5	6	17.29	31	58.1	5	42.12	37	58.5	5	20.77	29	58.7	2
17	60.22	38	33.1	7	17.60	30	58.6	3	42.49	37	59.0	6	21.06	28	58.5	— 2
27	60.60	37	33.8	8	17.90	29	58.9	3	42.86	35	59.6	8	21.34	27	58.7	7
Oct. 7	60.97	35	34.6	10	18.19	27	59.2	3	43.21	34	60.4	8	21.61	26	59.4	12
17	61.32	32	35.6	10	18.46	25	59.5	1	43.55	31	61.2	9	21.87	24	60.6	16
27	61.64	29	36.6	12	18.71	24	59.6	1	43.86	29	62.1	10	22.11	21	62.2	20
Nov. 6	61.93	26	37.8	13	18.95	21	59.7	0	44.15	26	63.1	11	22.32	19	64.2	22
16	62.19	22	39.1	13	19.16	18	59.7	0	44.41	22	64.2	11	22.51	15	66.4	24
26	62.41	18	40.4	13	19.34	14	59.7	0	44.63	17	65.3	12	22.66	11	68.8	25
Dec. 6	62.59	12	41.7	14	19.48	11	59.7	0	44.80	13	66.5	12	22.77	7	71.3	25
16	62.71	6	43.1	13	19.59	6	59.7	0	44.93	7	67.7	12	22.84	3	73.8	25
26	62.77	1	44.4	13	19.65	1	59.7	1	45.00	1	68.9	11	22.87	— 2	76.3	22
36	62.78		45.7		19.66		59.6		45.01		70.0		22.85		78.5	
Mittl. Ort	56.05		42.6		14.20		60.6		38.46		68.1		18.71		69.9	
	81)				372)				83)				554)			

1902	β Eridani. 3ᵐ.0.				19 H. Camelop. 5ᵐ.0.				μ Aurigae. 5ᵐ.6.				α Aurigae. 1ᵐ.			
	AR.		Decl. −		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	5h 3m		5° 12′		5h 6m		79° 6′		5h 6m		38° 21′		5h 9m		45° 53′	
Jan. 0	3.82	1	54.5	15	33.15	24	69.7	28	45.84	0	64.4	9	29.86	1	52.7	13
10	3.81	6	56.0	13	32.91	47	72.5	25	45.84	6	65.3	8	29.85	6	54.0	12
20	3.75	10	57.3	11	32.44	67	75.0	21	45.78	11	66.1	7	29.79	13	55.2	10
30	3.65	13	58.4	9	31.77	84	77.1	18	45.67	16	66.8	5	29.66	18	56.2	8
Febr. 9	3.52	15	59.3	6	30.93	96	78.9	12	45.51	19	67.3	3	29.48	22	57.0	5
19	3.37	18	59.9	5	29.97	104	80.1	6	45.32	22	67.6	1	29.26	25	57.5	2
März 1	3.19	18	60.4	2	28.93	109	80.7	1	45.10	23	67.7	— 1	29.01	26	57.7	— 1
11	3.01	19	60.6	0	27.84	107	80.8	— 5	44.87	23	67.6	4	28.75	26	57.6	4
21	2.82	18	60.6	2	26.77	102	80.3	11	44.64	21	67.2	6	28.49	25	57.2	7
31	2.64	15	60.4	4	25.75	92	79.2	15	44.43	19	66.6	8	28.24	22	56.5	9
April 10	2.49	13	60.0	7	24.83	77	77.7	20	44.24	16	65.8	9	28.02	18	55.6	12
20	2.36	9	59.3	9	24.06	61	75.7	23	44.08	11	64.9	10	27.84	13	54.4	13
30	2.27	5	58.4	11	23.45	42	73.4	26	43.97	6	63.9	11	27.71	8	53.1	14
Mai 10	2.22	1	57.3	13	23.03	22	70.8	28	43.91	1	62.8	10	27.63	1	51.7	14
20	2.21	— 3	56.0	14	22.81	— 2	68.0	28	43.90	— 5	61.8	10	27.62	— 5	50.3	15
30	2.24	8	54.6	18	22.83	23	65.2	28	43.95	11	60.8	9	27.67	10	48.8	13
Juni 9	2.32	12	52.8	17	23.06	48	62.4	31	44.06	17	59.9	9	27.77	19	47.5	14
19	2.44	16	51.1	17	23.54	63	59.3	25	44.23	21	59.0	7	27.96	23	46.1	11
29	2.60	19	49.4	17	24.17	80	56.8	23	44.44	25	58.3	5	28.19	27	45.0	9
Juli 9	2.79	22	47.7	17	24.97	96	54.5	20	44.69	28	57.8	4	28.46	31	44.1	8
19	3.01	24	46.0	16	25.93	109	52.5	17	44.97	32	57.4	2	28.77	34	43.3	6
29	3.25	26	44.4	14	27.02	120	50.8	13	45.29	33	57.2	1	29.11	37	42.7	3
Aug. 8	3.51	27	43.0	13	28.22	127	49.5	9	45.62	35	57.1	— 1	29.48	38	42.4	2
18	3.78	28	41.7	9	29.49	134	48.6	5	45.97	35	57.2	2	29.86	40	42.2	0
28	4.06	28	40.8	7	30.83	137	48.1	1	46.32	36	57.4	4	30.26	41	42.2	3
Sept. 7	4.34	27	40.1	3	32.20	137	48.0	— 4	46.68	36	57.8	4	30.67	40	42.5	4
17	4.61	27	39.8	0	33.57	135	48.4	8	47.04	36	58.2	5	31.07	39	42.9	5
27	4.88	27	39.8	4	34.92	132	49.2	12	47.40	34	58.7	6	31.46	39	43.4	7
Oct. 7	5.15	25	40.2	7	36.24	125	50.4	17	47.74	33	59.3	7	31.85	37	44.1	9
17	5.40	23	40.9	9	37.49	115	52.1	19	48.07	31	60.0	8	32.22	35	45.0	10
27	5.63	22	41.8	12	38.64	103	54.0	23	48.38	29	60.8	8	32.57	32	46.0	11
Nov. 6	5.85	19	43.0	15	39.67	88	56.3	27	48.67	25	61.6	9	32.89	29	47.1	12
16	6.04	16	44.5	16	40.55	70	59.0	28	48.92	22	62.5	9	33.18	25	48.3	14
26	6.20	12	46.1	16	41.25	52	61.8	29	49.14	18	63.4	10	33.43	19	49.7	14
Dec. 6	6.32	9	47.7	16	41.77	31	64.7	31	49.32	13	64.4	10	33.62	15	51.1	14
16	6.41	5	49.3	16	42.08	8	67.8	30	49.45	8	65.4	10	33.77	8	52.5	14
26	6.46	0	50.9	15	42.16	— 17	70.8	29	49.53	2	66.4	10	33.85	3	53.9	14
36	6.46		52.4		41.99		73.7		49.55		67.4		33.88		55.3	
Mittl. Ort	1.88		46.3		23.58		68.6		43.18		67.0		26.89		54.7	
	84)				373)				374)				86)			

1902	β Orionis. 1^m.				γ Orionis. $2^m.0$				β Tauri. $2^m.0$				17 Camelop. $6^m.0$			
	AR.		Decl. −		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	$5^h\ 9^m$		8° 18′		$5^h\ 19^m$		6° 15′		$5^h\ 20^m$		28° 31′		$5^h\ 20^m$		62° 58′	
Jan. 0	51.56		61.9		54.46		32.4		8.16		24.7		59.04		66.7	
		1		16		2		9		1		4		2		22
10	51.55		63.5		54.48	—	31.5		8.17	—	25.1		59.02		68.9	
		5		15		4		8		3		3		12		21
20	51.50		65.0		54.44		30.7		8.14		25.4		58.90		71.0	
		10		12		8		7		9		3		21		17
30	51.40		66.2		54.36		30.0		8.05		25.7		58.69		72.7	
		13		10		12		6		13		2		29		14
Febr. 9	51.27		67.2		54.24		29.4		7.92		25.9		58.40		74.1	
		15		8		14		4		16		1		35		11
19	51.12		68.0		54.10		29.0		7.76		26.0		58.05		75.2	
		18		5		17		4		19		1		40		6
März 1	50.94		68.5		53.93		28.6		7.57		26.1	—	57.65		75.8	
		19		2		18		2		20		1		42		1
11	50.75		68.7		53.75		28.4		7.37		26.0		57.23		75.9	—
		19		0		18		1		20		3		42		3
21	50.56		68.7		53.57		28.3		7.17		25.7		56.81		75.6	
		18		2		18		0		20		3		41		8
31	50.38		68.5		53.39		28.3		6.97		25.4		56.40		74.8	
		16		6		16		1		18		5		37		11
April 10	50.22		67.9		53.23		28.4		6.79		24.9		56.03		73.7	
		13		7		13		3		14		5		31		15
20	50.09		67.2		53.10		28.7		6.65		24.4		55.72		72.2	
		10		10		10		4		11		5		24		18
30	49.99		66.2		53.00		29.1		6.54		23.9		55.48		70.4	
		6		12		6		5		6		6		16		20
Mai 10	49.93		65.0		52.94		29.6		6.48		23.3		55.32		68.4	
		2		14		2		6		2		5		8		22
20	49.91	—	63.6		52.92	—	30.2		6.46	—	22.8		55.24	—	66.2	
		2		16		3		8		4		5		2		22
30	49.93		62.0		52.95		31.0		6.50		22.3		55.26		64.0	
		7		17		7		9		8		4		10		22
Juni 9	50.00		60.3		53.02		31.9		6.58		21.9		55.36		61.8	
		12		20		12		11		15		3		23		24
19	[9] 50.12		58.3		[12] 53.14		33.0		[12] 6.73		21.6		[12] 55.59		59.4	
		15		19		15		11		17		2		29		20
29	50.27		56.4		53.29		34.1		6.90		21.4		55.88		57.4	
		18		19		19		11		22		0		35		18
Juli 9	50.45		54.5		53.48		35.2		7.12		21.4		56.23		55.6	
		22		18		21		12		25		0		42		16
19	50.67		52.7		53.69		36.4		7.37		21.4		56.65		54.0	
		23		17		24		11		27		1		48		14
29	50.90		51.0		53.93		37.5		7.64		21.5		57.13		52.6	
		26		15		25		10		29		2		53		10
Aug. 8	51.16		49.5		54.18		38.5		7.93		21.7		57.66		51.6	
		26		13		27		9		31		2		55		8
18	51.42		48.2		54.45		39.4		8.24		21.9		58.21		50.8	
		28		10		28		8		32		3		58		4
28	51.70		47.2		54.73		40.2		8.56		22.2		58.79		50.4	
		28		7		28		6		32		3		59		1
Sept. 7	51.98		46.5		55.01		40.8		8.88		22.5		59.38		50.3	—
		28		3		29		3		32		3		60		2
17	52.26		46.2	—	55.30		41.1		9.20		22.8		59.98		50.5	
		27		1		28		1		32		3		60		5
27	52.53		46.3		55.58		41.2	—	9.52		23.1		60.58		51.0	
		27		4		28		2		32		3		58		8
Oct. 7	52.80		46.7		55.86		41.0		9.84		23.4		61.16		51.8	
		25		8		26		3		30		3		56		11
17	53.05		47.5		56.12		40.7		10.14		23.7		61.72		52.9	
		24		11		25		6		29		2		53		14
27	53.29		48.6		56.37		40.1		10.43		23.9		62.25		54.3	
		22		13		23		7		27		3		48		17
Nov. 6	53.51		49.9		56.60		39.4		10.70		24.2		62.73		56.0	
		19		16		21		9		24		3		44		19
16	53.70		51.5		56.81		38.5		10.94		24.5		63.17		57.9	
		17		18		19		10		21		3		36		21
26	53.87		53.3		57.00		37.5		11.15		24.8		63.53		60.0	
		13		18		15		10		18		3		29		22
Dec. 6	54.00		55.1		57.15		36.5		11.33		25.1		63.82		62.2	
		9		18		11		11		13		4		21		24
16	54.09		56.9		57.26		35.4		11.46		25.5		64.03		64.6	
		5		18		8		10		9		4		12		23
26	54.14		58.7		57.34		34.4		11.55		25.9		64.15		66.9	
		1		17		3		9		4		3		2		23
36	54.15		60.4		57.37		33.5		11.59		26.2		64.17		69.2	
Mittl. Ort	49.63		53.1		52.41		39.7		5.76		29.4		54.72		68.2	
		87)				91)				90)				375)		

1902	Gr. 966. 6m.5. AR.		Gr. 966. Decl. +		δ Orion. 2.2...2m.7. AR.		δ Orion. Decl. —		α Leporis. 3m.0. AR.		α Leporis. Decl. —		ι Orionis. 3m.1. AR.		ι Orionis. Decl. —	
	5h 26m		74° 58′		5h 26m		0° 22′		5h 28m		17° 53′		5h 30m		5° 58′	
Jan. 0	44.27	8	43.2	27	61.95	1	26.0	13	26.39	1	42.4	22	40.31	1	35.5	16
10	44.19	26	45.9	25	61.96	— 4	27.3	11	26.38	5	44.6	19	40.32	— 3	37.1	14
20	43.93	41	48.4	22	61.92	8	28.4	10	26.33	10	46.5	16	40.29	8	38.5	12
30	43.52	55	50.6	18	61.84	11	29.4	9	26.23	13	48.1	14	40.21	12	39.7	10
Febr. 9	42.97	65	52.4	14	61.73	14	30.3	6	26.10	16	49.5	10	40.09	14	40.7	8
19	42.32	73	53.8	8	61.59	17	30.9	4	25.94	19	50.5	7	39.95	17	41.5	6
März 1	41.59	77	54.6	4	61.42	18	31.3	3	25.75	20	51.2	4	39.78	19	42.1	3
11	40.82	77	55.0	— 3	61.24	19	31.6	1	25.55	20	51.6	0	39.59	19	42.4	0
21	40.05	75	54.7	8	61.05	18	31.7	— 1	25.35	20	51.6	3	39.40	18	42.4	1
31	39.30	69	53.9	12	60.87	16	31.6	3	25.15	18	51.3	7	39.22	17	42.3	4
April 10	38.61	59	52.7	16	60.71	14	31.3	4	24.97	16	50.6	9	39.05	14	41.9	6
20	38.02	48	51.1	22	60.57	10	30.9	7	24.81	12	49.7	13	38.91	11	41.3	9
30	37.54	35	48.9	24	60.47	7	30.2	8	24.69	9	48.4	15	38.80	8	40.4	10
Mai 10	37.19	20	46.5	25	60.40	3	29.4	10	24.60	5	46.9	17	38.72	3	39.4	12
20	36.99	4	44.0	27	60.37	— 2	28.4	11	24.55	0	45.2	20	38.69	— 1	38.2	14
30	36.95	— 11	41.3	27	60.39	6	27.3	12	24.55	4	43.2	21	38.70	5	36.8	16
Juni 9	37.06	30	38.6	29	60.45	11	26.1	15	24.59	10	41.1	24	38.75	10	35.2	18
19	[13] 37.36	42	35.7	26	[13] 60.56	14	24.6	15	[14] 24.69	13	38.7	23	[14] 38.85	13	33.4	17
29	37.78	55	33.1	23	60.70	17	23.1	14	24.82	16	36.4	23	38.98	17	31.7	17
Juli 9	38.33	67	30.8	21	60.87	20	21.7	14	24.98	19	34.1	22	39.15	20	30.0	17
19	39.00	77	28.7	18	61.07	23	20.3	14	25.17	22	31.9	20	39.35	22	28.3	16
29	39.77	85	26.9	14	61.30	25	18.9	13	25.39	25	29.9	18	39.57	24	26.7	14
Aug. 8	40.62	92	25.5	11	61.55	26	17.6	10	25.64	26	28.1	15	39.81	26	25.3	12
18	41.54	97	24.4	8	61.81	27	16.6	9	25.90	28	26.6	12	40.07	27	24.1	10
28	42.51	100	23.6	3	62.08	28	15.7	6	26.18	28	25.4	8	40.34	27	23.1	7
Sept. 7	43.51	102	23.3	— 1	62.36	28	15.1	3	26.46	28	24.6	3	40.61	28	22.4	3
17	44.53	102	23.4	4	62.64	28	14.8	1	26.74	29	24.3	— 1	40.89	28	22.1	0
27	45.55	100	23.8	8	62.92	27	14.7	— 3	27.03	27	24.4	5	41.17	27	22.1	4
Oct. 7	46.55	96	24.6	13	63.19	27	15.0	6	27.30	27	24.9	10	41.44	27	22.5	7
17	47.51	90	25.9	16	63.46	25	15.6	8	27.57	25	25.9	14	41.71	25	23.2	10
27	48.41	82	27.5	19	63.71	23	16.4	11	27.82	23	27.3	18	41.96	23	24.2	13
Nov. 6	49.23	72	29.4	23	63.94	21	17.5	12	28.05	21	29.1	20	42.19	21	25.5	15
16	49.95	61	31.7	25	64.15	19	18.7	14	28.26	18	31.1	22	42.40	19	27.0	17
26	50.56	47	34.2	28	64.34	15	20.1	14	28.44	14	33.3	23	42.59	15	28.7	17
Dec. 6	51.03	32	37.0	28	64.49	11	21.5	15	28.58	11	35.6	24	42.74	12	30.4	18
16	51.35	16	39.8	28	64.60	8	23.0	14	28.69	6	38.0	24	42.86	7	32.2	17
26	51.51	0	42.6	29	64.68	3	24.4	13	28.75	1	40.4	22	42.93	3	33.9	16
36	51.51		45.5		64.71		25.7		28.76		42.6		42.96		35.5	
Mittl. Ort	37.11		44.5		59.93		17.8		24.42		32.5		38.32		26.7	
	92)				93)				556)				96)			

1902	ε Orionis. $2^m.0$.				ζ Tauri. $3^m.3$.				o Aurigae. $5^m.8$.				ζ Leporis. $3^m.6$.			
	AR.		Decl. −		AR.		Decl. +		AR.		Decl. +		AR.		Decl. −	
	$5^h\ 31^m$		1° 15′		$5^h\ 31^m$		21° 4′		$5^h\ 38^m$		49° 46′		$5^h\ 42^m$		14° 51′	
Jan. 0	16.38	1	59.9	13	49.49	3	52.3	1	21.60	2	56.2	15	32.86	1	39.6	21
10	16.39	3	61.2	12	49.52	2	52.2	0	21.62	4	57.7	15	32.87	3	41.7	19
20	16.36	8	62.4	10	49.50	7	52.2	1	21.58	11	59.2	14	32.84	8	43.6	16
30	16.28	11	63.4	9	49.43	11	52.1	0	21.47	17	60.6	11	32.76	12	45.2	13
Febr. 9	16.17	14	64.3	7	49.32	15	52.1	0	21.30	22	61.7	8	32.64	15	46.5	11
19	16.03	17	65.0	4	49.17	17	52.1	1	21.08	25	62.5	6	32.49	18	47.6	7
März 1	15.86	18	65.4	3	49.00	19	52.0	1	20.83	28	63.1	2	32.31	19	48.3	4
11	15.68	18	65.7	1	48.81	20	51.9	1	20.55	29	63.3	1	32.12	20	48.7	1
21	15.50	18	65.8	1	48.61	18	51.8	2	20.26	28	63.2	4	31.92	19	48.8	2
31	15.32	17	65.7	3	48.43	17	51.6	2	19.98	26	62.8	8	31.73	18	48.6	5
April 10	15.15	14	65.4	4	48.26	15	51.4	3	19.72	23	62.0	10	31.55	16	48.1	8
20	15.01	11	65.0	7	48.11	11	51.1	2	19.49	17	61.0	12	31.39	13	47.3	11
30	14.90	7	64.3	8	48.00	7	50.9	1	19.32	12	59.8	15	31.26	10	46.2	13
Mai 10	14.83	3	63.5	10	47.93	2	50.8	1	19.20	6	58.3	15	31.16	5	44.9	16
20	14.80	1	62.5	12	47.91	2	50.7	1	19.14	1	56.8	16	31.11	1	43.3	18
30	14.81	5	61.3	13	47.93	7	50.6	0	19.15	7	55.2	16	31.10	3	41.5	19
Juni 9	14.86	11	60.0	15	48.00	12	50.6	2	19.22	15	53.6	17	31.13	8	39.6	22
19	14.97	13	58.5	15	48.12	16	50.8	2	19.37	20	51.9	15	31.21	12	37.4	22
29	15.10	17	57.0	15	48.28	19	51.0	2	19.57	25	50.4	13	31.33	15	35.2	21
Juli 9	15.27	20	55.5	15	48.47	22	51.2	4	19.82	30	49.1	11	31.48	19	33.1	20
19	15.47	23	54.0	14	48.69	25	51.6	4	20.12	34	48.0	10	31.67	21	31.1	19
29	15.70	24	52.6	12	48.94	27	52.0	4	20.46	37	47.0	8	31.88	23	29.2	17
Aug. 8	15.94	26	51.4	11	49.21	28	52.4	4	20.83	39	46.2	6	32.11	25	27.5	15
18	16.20	27	50.3	9	49.49	30	52.8	4	21.22	41	45.6	4	32.36	27	26.0	12
28	16.47	28	49.4	6	49.79	30	53.2	3	21.63	43	45.2	1	32.63	28	24.8	7
Sept. 7	16.75	28	48.8	3	50.09	30	53.5	2	22.06	43	45.1	0	32.91	28	24.1	4
17	17.03	28	48.5	0	50.39	31	53.7	2	22.49	43	45.1	2	33.19	28	23.7	0
27	17.31	27	48.5	3	50.70	30	53.9	1	22.92	43	45.3	4	33.47	28	23.7	5
Oct. 7	17.58	26	48.8	6	51.00	29	54.0	0	23.35	41	45.7	7	33.75	27	24.2	9
17	17.84	26	49.4	8	51.29	28	54.0	1	23.76	40	46.4	8	34.02	26	25.1	13
27	18.10	24	50.2	11	51.57	26	53.9	2	24.16	37	47.2	10	34.28	24	26.4	16
Nov. 6	18.34	21	51.3	13	51.83	24	53.7	2	24.53	34	48.2	12	34.52	22	28.0	19
16	18.55	19	52.6	14	52.07	21	53.5	2	24.87	30	49.4	13	34.74	19	29.9	21
26	18.74	15	54.0	15	52.28	18	53.3	1	25.17	25	50.7	15	34.93	16	32.0	22
Dec. 6	18.89	12	55.5	15	52.46	14	53.2	2	25.42	19	52.2	15	35.09	12	34.2	23
16	19.01	8	57.0	15	52.60	9	53.0	1	25.61	13	53.7	16	35.21	8	36.5	22
26	19.09	3	58.5	14	52.69	5	52.9	1	25.74	6	55.3	16	35.29	2	38.7	21
36	19.12		59.9		52.74		52.8		25.80		56.9		35.31		40.8	
Mittl. Ort	14.36		51.5		47.23		58.5		18.41		60.3		30.87		29.9	
	97)				98)				377)				558)			

1902	κ Orionis. 2ᵐ.6. AR.	Diff.	κ Orionis. Decl. —	Diff.	α Orionis. 1...1ᵐ.4. AR.	Diff.	α Orionis. Decl. +	Diff.	δ Aurigae. 4ᵐ.1. AR.	Diff.	δ Aurigae. Decl. +	Diff.	β Aurigae. 2ᵐ.0. AR.	Diff.	β Aurigae. Decl. +	Diff.
	5ʰ 43ᵐ		9° 42′		5ʰ 49ᵐ		7° 23′		5ʰ 51ᵐ		54° 16′		5ʰ 52ᵐ		44° 56′	
Jan. 0	8.44	2	24.7	18	54.03	4	12.4	9	30.88	5	33.9	19	23.32	6	9.9	13
10	8.46	—3	26.5	17	54.07	—1	11.5	8	30.93	—4	35.8	17	23.38	—2	11.2	13
20	8.43	7	28.2	14	54.06	6	10.7	6	30.89	11	37.5	16	23.36	8	12.5	12
30	8.36	11	29.6	12	54.00	9	10.1	6	30.78	17	39.1	14	23.28	14	13.7	10
Febr. 9	8.25	15	30.8	9	53.91	13	9.5	4	30.61	24	40.5	11	23.14	18	14.7	8
19	8.10	17	31.7	6	53.78	16	9.1	4	30.37	28	41.6	8	22.96	22	15.5	6
März 1	7.93	19	32.3	4	53.62	18	8.7	2	30.09	31	42.4	4	22.74	25	16.1	3
11	7.74	19	32.7	1	53.44	19	8.5	1	29.78	32	42.8	0	22.49	26	16.4	0
21	7.55	19	32.8	—1	53.25	18	8.4	0	29.46	32	42.8	4	22.23	26	16.4	3
31	7.36	18	32.7	4	53.07	17	8.4	1	29.14	30	42.4	6	21.97	24	16.1	5
April 10	7.18	15	32.3	7	52.90	14	8.5	2	28.84	26	41.8	11	21.73	21	15.6	8
20	7.03	12	31.6	9	52.76	12	8.7	4	28.58	21	40.7	13	21.52	17	14.8	10
30	6.91	9	30.7	12	52.64	8	9.1	4	28.37	15	39.4	15	21.35	12	13.8	12
Mai 10	6.82	5	29.5	13	52.56	4	9.5	6	28.22	9	37.9	17	21.23	6	12.6	12
20	6.77	0	28.2	15	52.52	0	10.1	6	28.13	2	36.2	18	21.17	1	11.4	13
30	6.77	4	26.7	17	52.52	4	10.7	8	28.11	—5	34.4	18	21.16	—5	10.1	14
Juni 9	6.81	8	25.0	20	52.56	9	11.5	8	28.16	12	32.6	18	21.21	10	8.7	13
19	[17] 6.89	12	23.0	19	52.65	13	12.3	11	28.28	21	30.8	19	21.31	19	7.4	14
29	7.01	15	21.1	19	[19] 52.78	16	13.4	9	[19] 28.49	26	28.9	16	[20] 21.50	22	6.0	11
Juli 9	7.16	19	19.2	18	52.94	19	14.3	10	28.75	30	27.3	15	21.72	26	4.9	10
19	7.35	21	17.4	17	53.13	22	15.3	10	29.05	35	25.8	13	21.98	30	3.9	9
29	7.56	23	15.7	16	53.35	24	16.3	9	29.40	39	24.5	11	22.28	33	3.0	7
Aug. 8	7.79	25	14.1	13	53.59	25	17.2	8	29.79	42	23.4	9	22.61	35	2.3	6
18	8.04	27	12.8	11	53.84	27	18.0	6	30.21	44	22.5	6	22.96	37	1.7	4
28	8.31	27	11.7	7	54.11	28	18.6	4	30.65	46	21.9	4	23.33	38	1.3	3
Sept. 7	8.58	28	11.0	3	54.39	29	19.0	3	31.11	48	21.5	2	23.71	40	1.0	1
17	8.86	28	10.7	0	54.68	28	19.3	0	31.59	47	21.3	0	24.11	40	0.9	0
27	9.14	28	10.7	4	54.96	28	19.3	2	32.06	47	21.3	3	24.51	40	0.9	2
Oct. 7	9.42	27	11.1	8	55.24	28	19.1	5	32.53	47	21.6	6	24.91	39	1.1	4
17	9.69	26	11.9	12	55.52	27	18.6	6	33.00	45	22.2	7	25.30	37	1.5	5
27	9.95	24	13.1	14	55.79	26	18.0	8	33.45	42	22.9	10	25.67	35	2.0	7
Nov. 6	10.19	22	14.5	17	56.05	23	17.2	10	33.87	39	23.9	13	26.02	33	2.7	8
16	10.41	20	16.2	19	56.28	21	16.2	10	34.26	34	25.2	14	26.35	29	3.5	10
26	10.61	16	18.1	19	56.49	18	15.2	11	34.60	29	26.6	16	26.64	25	4.5	11
Dec. 6	10.77	12	20.0	20	56.67	14	14.1	10	34.89	23	28.2	18	26.89	20	5.6	12
16	10.89	8	22.0	20	56.81	11	13.1	10	35.12	15	30.0	18	27.09	14	6.8	13
26	10.97	4	24.0	19	56.92	6	12.1	9	35.27	9	31.8	20	27.23	9	8.1	13
36	11.01		25.9		56.98		11.2		35.36		33.8		27.32		9.4	
Mittl. Ort	6.44		15.4		51.92		20.6		27.41		38.9		20.39		15.5	
	100)				102)				379)				103)			

1902	ϑ Aurigae. 3m.0. AR.		Decl. +		ν Orionis. 4m.6. AR.		Decl. +		22 H. Camelop. 4m.6. AR.		Decl. +		η Gemin. 3.2...4m.2. AR.		Decl. +	
	5h 53m		37° 12′		6h 1m		14° 46′		6h 8m		69° 20′		6h 8m		22° 31′	
Jan. 0	4.97	5	15.3	9	60.77	5	41.4	5	8.18	7	71.1	25	60.04	6	59.7	0
10	5.02	0	16.2	9	60.82	0	40.9	4	8.25	6	73.6	25	60.10	1	59.7	0
20	5.02	7	17.1	8	60.82	5	40.5	3	8.19	19	76.1	23	60.11	4	59.7	1
30	4.95	11	17.9	7	60.77	9	40.2	3	8.00	30	78.4	20	60.07	8	59.8	2
Febr. 9	4.84	16	18.6	5	60.68	12	39.9	2	7.70	40	80.4	17	59.99	13	60.0	1
19	4.68	20	19.1	4	60.56	16	39.7	1	7.30	47	82.1	13	59.86	16	60.1	1
März 1	4.48	22	19.5	2	60.40	18	39.6	1	6.83	53	83.4	7	59.70	18	60.2	0
11	4.26	23	19.7	1	60.22	18	39.5	0	6.30	56	84.1	3	59.52	20	60.2	0
21	4.03	22	19.8	2	60.04	19	39.5	0	5.74	56	84.4	2	59.32	20	60.2	0
31	3.81	21	19.6	5	59.85	18	39.5	1	5.18	53	84.2	7	59.12	18	60.2	1
April 10	3.60	18	19.1	6	59.67	15	39.4	1	4.65	48	83.5	11	58.94	16	60.1	1
20	3.42	15	18.5	7	59.52	12	39.5	1	4.17	42	82.4	15	58.78	13	60.0	1
30	3.27	10	17.8	8	59.40	9	39.6	1	3.75	32	80.9	19	58.65	10	59.9	2
Mai 10	3.17	6	17.0	9	59.31	5	39.7	2	3.43	22	79.0	22	58.55	5	59.7	2
20	3.11	0	16.1	10	59.26	0	39.9	2	3.21	12	76.8	24	58.50	2	59.5	2
30	3.11	5	15.1	9	59.26	4	40.1	4	3.09	0	74.4	25	58.48	4	59.3	1
Juni 9	3.16	10	14.2	8	59.30	8	40.5	4	3.09	10	71.9	25	58.52	7	59.2	0
19	3.26	17	13.4	10	59.38	13	40.9	5	3.19	25	69.4	27	58.59	13	59.2	0
29	[20] 3.43	20	12.4	7	[22] 59.51	16	41.4	5	[23] 3.44	33	66.7	24	[24] 58.72	16	59.2	0
Juli 9	3.63	23	11.7	6	59.67	19	41.9	6	3.77	42	64.3	22	58.88	19	59.2	1
19	3.86	27	11.1	5	59.86	22	42.5	5	4.19	50	62.1	20	59.07	22	59.3	1
29	4.13	30	10.6	5	60.08	24	43.0	5	4.69	58	60.1	18	59.29	25	59.4	2
Aug. 8	4.43	32	10.1	3	60.32	26	43.5	5	5.27	63	58.3	16	59.54	27	59.6	1
18	4.75	33	9.8	2	60.58	27	44.0	3	5.90	68	56.7	12	59.81	28	59.7	1
28	5.08	35	9.6	1	60.85	29	44.3	3	6.58	73	55.5	9	60.09	29	59.8	0
Sept. 7	5.43	35	9.5	1	61.14	29	44.6	1	7.31	75	54.6	6	60.38	31	59.8	0
17	5.78	36	9.4	1	61.43	29	44.7	0	8.05	76	54.0	2	60.69	30	59.8	1
27	6.14	35	9.5	1	61.72	30	44.7	2	8.82	76	53.8	2	60.99	31	59.7	2
Oct. 7	6.49	35	9.6	1	62.02	29	44.5	4	9.58	75	54.0	5	61.30	31	59.5	2
17	6.84	34	9.7	3	62.31	28	44.1	4	10.33	73	54.5	9	61.61	30	59.3	3
27	7.18	32	10.0	4	62.59	27	43.7	5	11.06	69	55.4	13	61.91	29	59.0	3
Nov. 6	7.50	29	10.4	5	62.86	25	43.2	6	11.75	63	56.7	16	62.20	27	58.7	4
16	7.79	27	10.9	5	63.11	22	42.6	8	12.38	56	58.3	19	62.47	25	58.3	3
26	8.06	23	11.4	7	63.33	20	41.8	7	12.94	47	60.2	22	62.72	21	58.0	3
Dec. 6	8.29	18	12.1	8	63.53	16	41.1	7	13.41	38	62.4	24	62.93	18	57.7	2
16	8.47	14	12.9	8	63.69	12	40.4	5	13.79	25	64.8	25	63.11	13	57.5	1
26	8.61	8	13.7	9	63.81	7	39.9	5	14.04	13	67.3	26	63.24	9	57.4	0
36	8.69		14.6		63.88		39.4		14.17		69.9		63.33		57.4	
Mittl. Ort	2.33		21.6		58.58		49.5		2.85		77.0		57.74		67.8	
	104)				382)				383)				105)			

1902	μ Geminorum. 3ᵐ.0. AR.		μ Geminorum. Decl. +		ψ¹ Aurigae. 5ᵐ.1. AR.		ψ¹ Aurigae. Decl. +		β Canis maj. 2ᵐ.6. AR.		β Canis maj. Decl. −		8 Monocerot. 4ᵐ.7. AR.		8 Monocerot. Decl. +	
	6ʰ 17ᵐ		22° 33′		6ʰ 17ᵐ		49° 19′		6ʰ 18ᵐ		17° 54′		6ʰ 18ᵐ		4° 38′	
Jan. 0	4.21	7	42.6	0	24.23	8	69.7	16	25.07	3	35.4	24	36.64	6	24.7	11
10	4.28	2	42.6	0	24.31	1	71.3	15	25.10	0	37.8	21	36.70	2	23.6	10
20	4.30	3	42.6	1	24.32	6	72.8	15	25.10	5	39.9	19	36.72	4	22.6	9
30	4.27	8	42.7	1	24.26	12	74.3	14	25.05	10	41.8	17	36.68	8	21.7	7
Febr. 9	4.19	12	42.8	2	24.14	18	75.7	11	24.95	14	43.5	13	36.60	11	21.0	5
19	4.07	16	43.0	1	23.96	23	76.8	9	24.81	17	44.8	10	36.49	15	20.5	4
März 1	3.91	18	43.1	1	23.73	27	77.7	7	24.64	19	45.8	7	36.34	17	20.1	3
11	3.73	19	43.2	0	23.46	28	78.4	2	24.45	20	46.5	3	36.17	18	19.8	1
21	3.54	19	43.2	0	23.18	29	78.6	0	24.25	20	46.8	0	35.99	19	19.7	0
31	3.35	19	43.2	0	22.89	27	78.6	4	24.05	20	46.8	3	35.80	17	19.7	1
April 10	3.16	17	43.2	1	22.62	24	78.2	6	23.85	17	46.5	7	35.63	16	19.8	3
20	2.99	13	43.1	2	22.38	21	77.6	10	23.68	15	45.8	10	35.47	13	20.1	4
30	2.86	10	42.9	1	22.17	16	76.6	12	23.53	13	44.8	12	35.34	10	20.5	5
Mai 10	2.76	7	42.8	2	22.01	10	75.4	13	23.40	8	43.6	15	35.24	6	21.0	6
20	2.69	2	42.6	1	21.91	5	74.1	15	23.32	5	42.1	18	35.18	3	21.6	8
30	2.67	3	42.5	1	21.86	2	72.6	16	23.27	0	40.3	19	35.15	2	22.4	8
Juni 9	2.70	7	42.4	1	21.88	8	71.0	15	23.27	4	38.4	20	35.17	6	23.2	10
19	2.77	12	42.3	1	21.96	15	69.5	17	23.31	9	36.4	24	35.23	10	24.2	11
29	[26] 2.89	15	42.2	0	[26] 22.11	20	67.8	15	[26] 23.40	11	34.0	22	[26] 35.33	13	25.3	11
Juli 9	3.04	18	42.2	1	22.31	25	66.3	14	23.51	15	31.8	21	35.46	17	26.4	10
19	3.22	22	42.3	1	22.56	29	64.9	13	23.66	18	29.7	21	35.63	19	27.4	10
29	3.44	24	42.4	1	22.85	32	63.6	11	23.84	21	27.6	18	35.82	21	28.4	9
Aug. 8	3.68	26	42.5	0	23.17	36	62.5	10	24.05	23	25.8	16	36.03	24	29.3	8
18	3.94	28	42.5	0	23.53	39	61.5	9	24.28	25	24.2	13	36.27	25	30.1	6
28	4.22	29	42.5	0	23.92	40	60.6	6	24.53	27	22.9	9	36.52	27	30.7	4
Sept. 7	4.51	30	42.5	1	24.32	42	60.0	5	24.80	28	22.0	5	36.79	28	31.1	2
17	4.81	31	42.4	1	24.74	43	59.5	3	25.08	28	21.5	1	37.07	28	31.3	1
27	5.12	31	42.3	3	25.17	43	59.2	1	25.36	29	21.4	4	37.35	28	31.2	3
Oct. 7	5.43	31	42.0	3	25.60	43	59.1	2	25.65	29	21.8	9	37.63	29	30.9	5
17	5.74	30	41.7	3	26.03	42	59.3	3	25.94	28	22.7	13	37.92	27	30.4	9
27	6.04	30	41.4	4	26.45	40	59.6	5	26.22	26	24.0	16	38.19	27	29.5	10
Nov. 6	6.34	28	41.0	3	26.85	38	60.1	8	26.48	25	25.6	20	38.46	26	28.5	11
16	6.62	25	40.7	4	27.23	34	60.9	10	26.73	22	27.6	22	38.72	23	27.4	13
26	6.87	22	40.3	3	27.57	30	61.9	12	26.95	19	29.8	24	38.95	20	26.1	13
Dec. 6	7.09	19	40.0	2	27.87	25	63.1	13	27.14	16	32.2	25	39.15	17	24.8	13
16	7.28	14	39.8	2	28.12	18	64.4	15	27.30	11	34.7	25	39.32	13	23.5	12
26	7.42	10	39.6	1	28.30	12	65.9	16	27.41	6	37.2	24	39.45	8	22.3	12
36	7.52		39.5		28.42		67.5		27.47		39.6		39.53		21.1	
Mittl. Ort	1.91		51.1		21.11		77.3		23.01		25.8		34.54		33.9	
	106)				385)				561)				386)			

1902	10 Monocerot. 5ᵐ.0.				8 Lyncis. 6ᵐ.0.				23H.Camelop. 5ᵐ.3.				ξ² Canis maj. 5ᵐ.1.			
	AR.		Decl. −		AR.		Decl. +		AR.		Decl. +		AR.		Decl. −	
	$6^h\ 23^m$		4° 42′		$6^h\ 28^m$		61° 33′		$6^h\ 29^m$		79° 39′		$6^h\ 30^m$		22° 53′	
Jan. 0	9.26	5	14.9	17	48.10	12	55.5	23	40.66	15	66.9	29	59.06	4	22.6	26
10	9.31	2	16.6	15	48.22	1	57.8	22	40.81	— 9	69.8	29	59.10	0	25.2	24
20	9.33	— 4	18.1	13	48.23	— 8	60.0	20	40.72	34	72.7	28	59.10	5	27.6	22
30	9.29	8	19.4	12	48.15	18	62.0	19	40.38	57	75.5	24	59.05	9	29.8	19
Febr. 9	9.21	11	20.6	9	47.97	25	63.9	16	39.81	76	77.9	21	58.96	14	31.7	16
19	9.10	15	21.5	6	47.72	32	65.5	13	39.05	93	80.0	17	58.82	18	33.3	12
März 1	8.95	18	22.1	5	47.40	37	66.8	10	38.12	105	81.7	11	58.64	19	34.5	8
11	8.77	18	22.6	2	47.03	39	67.8	5	37.07	113	82.8	6	58.45	21	35.3	5
21	8.59	19	22.8	0	46.64	41	68.3	0	35.94	114	83.4	1	58.24	21	35.8	1
31	8.40	18	22.8	2	46.23	39	68.3	3	34.80	112	83.5	— 5	58.03	21	35.9	— 3
April 10	8.22	16	22.6	4	45.84	36	68.0	8	33.68	104	83.0	11	57.82	19	35.6	7
20	8.06	14	22.2	7	45.48	32	67.2	12	32.64	93	81.9	15	57.63	17	34.9	9
30	7.92	11	21.5	8	45.16	25	66.0	15	31.71	78	80.4	20	57.46	13	34.0	13
Mai 10	7.81	7	20.7	10	44.91	18	64.5	17	30.93	60	78.4	24	57.33	10	32.7	16
20	7.74	3	19.7	12	44.73	11	62.8	20	30.33	41	76.0	26	57.23	6	31.1	19
30	7.71	0	18.5	13	44.62	2	60.8	21	29.92	20	73.4	27	57.17	3	29.2	20
Juni 9	7.71	5	17.2	15	44.60	— 6	58.7	22	29.72	— 2	70.7	29	57.14	— 2	27.2	23
19	7.76	9	15.7	16	44.66	16	56.5	24	29.74	24	67.8	30	57.16	6	24.9	24
29	[27] 7.85	12	14.1	15	[28] 44.82	22	54.1	22	29.98	49	64.8	32	57.22	11	22.5	25
Juli 9	7.97	16	12.6	15	45.04	29	51.9	20	[29] 30.47	64	61.6	28	[29] 57.33	14	20.0	23
19	8.13	18	11.1	15	45.33	36	49.9	19	31.11	82	58.8	26	57.47	17	17.7	22
29	8.31	21	9.6	13	45.69	41	48.0	18	31.93	97	56.2	23	57.64	20	15.5	21
Aug. 8	8.52	22	8.3	11	46.10	45	46.2	15	32.90	112	53.9	20	57.84	22	13.4	18
18	8.74	25	7.2	9	46.55	50	44.7	13	34.02	124	51.9	18	58.06	25	11.6	14
28	8.99	26	6.3	7	47.05	53	43.4	11	35.26	133	50.1	14	58.31	27	10.2	10
Sept. 7	9.25	27	5.6	3	47.58	56	42.3	8	36.59	140	48.7	9	58.58	28	9.2	6
17	9.52	28	5.3	0	48.14	57	41.5	5	37.99	144	47.8	6	58.86	29	8.6	2
27	9.80	28	5.3	4	48.71	57	41.0	1	39.43	146	47.2	2	59.15	29	8.4	— 4
Oct. 7	10.08	28	5.7	7	49.28	57	40.9	— 1	40.89	146	47.0	— 3	59.44	29	8.8	8
17	10.36	28	6.4	10	49.85	57	41.0	4	42.35	142	47.3	8	59.73	29	9.6	13
27	10.64	27	7.4	13	50.42	54	41.4	8	43.77	135	48.1	12	60.02	28	10.9	18
Nov. 6	10.91	25	8.7	15	50.96	51	42.2	11	45.12	124	49.3	16	60.30	26	12.7	21
16	11.16	23	10.2	17	51.47	47	43.3	13	46.36	111	50.9	20	60.56	23	14.8	24
26	11.39	20	11.9	18	51.94	40	44.6	17	47.47	95	52.9	24	60.79	20	17.2	26
Dec. 6	11.59	16	13.7	19	52.34	33	46.3	19	48.42	75	55.3	26	60.99	17	19.8	27
16	11.75	13	15.6	18	52.67	25	48.2	21	49.17	52	57.9	28	61.16	12	22.5	27
26	11.88	7	17.4	17	52.92	16	50.3	22	49.69	28	60.7	30	61.28	7	25.2	27
36	11.95		19.1		53.08		52.5		49.97		63.7		61.35		27.9	
Mittl. Ort	7.20		5.5		44.07		63.8		30.99		74.7		56.96		13.1	
	562)				388)				387)				563)			

1902	51 Aurigae. 6m.4. AR.	Diff.	Decl. +	Diff.	γ Geminorum. 2m.3. AR.	Diff.	Decl. +	Diff.
	6h 31m		39° 28′		6h 32m		16° 28′	
Jan. 0	54.78	10	29.9	10	5.25	9	49.9	4
10	54.88	3	30.9	10	5.34	3	49.5	4
20	54.91	2	31.9	10	5.37	2	49.1	2
30	54.89	9	32.9	10	5.35	7	48.9	1
Febr. 9	54.80	13	33.9	9	5.28	10	48.8	1
19	54.67	18	34.8	7	5.18	15	48.7	0
März 1	54.49	22	35.5	5	5.03	17	48.7	0
11	54.27	23	36.0	4	4.86	18	48.7	0
21	54.04	23	36.4	1	4.68	19	48.7	0
31	53.81	23	36.5	2	4.49	18	48.7	1
April 10	53.58	21	36.3	3	4.31	16	48.8	1
20	53.37	18	36.0	6	4.15	14	48.9	1
30	53.19	14	35.4	7	4.01	11	49.0	1
Mai 10	53.05	9	34.7	9	3.90	7	49.1	1
20	52.96	5	33.8	10	3.83	4	49.2	1
30	52.91	1	32.8	10	3.79	1	49.3	2
Juni 9	52.92	6	31.8	11	3.80	6	49.5	3
19	52.98	11	30.7	10	3.86	9	49.8	3
29	53.09	17	29.7	11	3.95	14	50.1	3
Juli 9	[29] 53.26	19	28.6	10	[29] 4.09	16	50.4	4
19	53.45	24	27.6	9	4.25	20	50.8	3
29	53.69	27	26.7	8	4.45	22	51.1	3
Aug. 8	53.96	30	25.9	8	4.67	24	51.4	2
18	54.26	32	25.1	6	4.91	26	51.6	2
28	54.58	33	24.5	6	5.17	27	51.8	0
Sept. 7	54.91	36	23.9	5	5.44	28	51.8	1
17	55.27	36	23.4	4	5.72	30	51.7	2
27	55.63	37	23.0	3	6.02	30	51.5	3
Oct. 7	56.00	37	22.7	2	6.32	30	51.2	5
17	56.37	37	22.5	1	6.62	30	50.7	6
27	56.74	35	22.4	1	6.92	29	50.1	6
Nov. 6	57.09	34	22.5	2	7.21	27	49.5	8
16	57.43	31	22.7	4	7.48	25	48.7	7
26	57.74	28	23.1	5	7.73	23	48.0	7
Dec. 6	58.02	23	23.6	7	7.96	20	47.3	7
16	58.25	18	24.3	9	8.16	15	46.6	6
26	58.43	13	25.2	9	8.31	10	46.0	5
36	58.56		26.1		8.41		45.5	
Mittl. Ort	52.10		38.9		3.04		59.3	
	389)				107)			

1902	S Monoc. 5.0...5m.5. AR.	Diff.	Decl. +	Diff.	ε Geminorum. 3m.3. AR.	Diff.	Decl. +	Diff.
	6h 35m		9° 58′		6h 37m		25° 13′	
Jan. 0	37.02	8	62.0	8	56.49	9	32.7	1
10	37.10	3	61.2	7	56.58	4	32.8	2
20	37.13	1	60.5	6	56.62	1	33.0	3
30	37.12	7	59.9	5	56.61	6	33.3	3
Febr. 9	37.05	10	59.4	4	56.55	11	33.6	3
19	36.95	14	59.0	2	56.44	15	33.9	3
März 1	36.81	16	58.8	1	56.29	18	34.2	3
11	36.65	18	58.7	0	56.11	19	34.5	2
21	36.47	19	58.7	0	55.92	20	34.7	1
31	36.28	18	58.7	1	55.72	19	34.8	0
April 10	36.10	16	58.8	1	55.53	18	34.8	1
20	35.94	14	58.9	3	55.35	15	34.7	2
30	35.80	10	59.2	3	55.20	12	34.5	2
Mai 10	35.70	8	59.5	4	55.08	8	34.3	2
20	35.62	3	59.9	5	55.00	4	34.1	3
30	35.59	0	60.4	5	54.96	1	33.8	3
Juni 9	35.59	5	60.9	6	54.97	5	33.5	2
19	35.64	8	61.5	7	55.02	9	33.3	3
29	35.72	13	62.2	8	55.11	14	33.0	2
Juli 9	[30] 35.85	16	63.0	7	[1] 55.25	17	32.8	1
19	36.01	18	63.7	6	55.42	20	32.7	2
29	36.19	20	64.3	6	55.62	23	32.5	2
Aug. 8	36.39	23	64.9	5	55.85	25	32.3	2
18	36.62	25	65.4	4	56.10	27	32.1	2
28	36.87	27	65.8	2	56.37	29	31.9	2
Sept. 7	37.14	27	66.0	0	56.66	30	31.7	3
17	37.41	29	66.0	1	56.96	31	31.4	3
27	37.70	29	65.9	4	57.27	31	31.1	4
Oct. 7	37.99	29	65.5	5	57.58	32	30.7	4
17	38.28	29	65.0	8	57.90	32	30.3	5
27	38.57	28	64.2	9	58.22	31	29.8	4
Nov. 6	38.85	27	63.3	10	58.53	30	29.4	4
16	39.12	25	62.3	10	58.83	27	29.0	3
26	39.37	22	61.3	11	59.10	25	28.7	3
Dec. 6	39.59	19	60.2	11	59.35	21	28.4	2
16	39.78	15	59.1	10	59.56	17	28.2	0
26	39.93	10	58.1	9	59.73	12	28.2	0
36	40.03		57.2		59.85		28.2	
Mittl. Ort	34.88		71.6		54.16		42.3	
	108)				109)			

1902	ξ Geminorum. 3ᵐ.6. AR.		Decl. +		α Canis maj.*) 1ᵐ. AR.		Decl. −	
	6ʰ 39ᵐ		12° 59′		6ʰ 40ᵐ		16° 34′	
Jan. 0	49.51	9	55.3	7	51.84	6	62.7	24
10	49.60	4	54.6	6	51.90	2	65.1	22
20	49.64	1	54.0	5	51.92	4	67.3	19
30	49.63	6	53.5	3	51.88	9	69.2	17
Febr. 9	49.57	10	53.2	2	51.79	13	70.9	15
19	49.47	14	53.0	1	51.66	16	72.4	10
März 1	49.33	17	52.9	1	51.50	18	73.4	8
11	49.16	18	52.8	0	51.32	19	74.2	4
21	48.98	18	52.8	1	51.13	20	74.6	2
31	48.80	18	52.9	1	50.93	20	74.8	2
April 10	48.62	17	53.0	1	50.73	18	74.6	5
20	48.45	14	53.1	2	50.55	16	74.1	9
30	48.31	11	53.3	2	50.39	13	73.2	11
Mai 10	48.20	8	53.5	3	50.26	9	72.1	13
20	48.12	3	53.8	3	50.17	6	70.8	16
30	48.09	0	54.1	3	50.11	2	69.2	17
Juni 9	48.09	4	54.4	5	50.09	2	67.5	19
19	48.13	8	54.9	5	50.11	6	65.6	20
29	48.21	13	55.4	5	50.17	11	63.6	22
Juli 9	[1] 48.34	15	55.9	5	[1] 50.28	13	61.4	20
19	48.49	18	56.4	5	50.41	17	59.4	19
29	48.67	21	56.9	4	50.58	19	57.5	18
Aug. 8	48.88	23	57.3	4	50.77	22	55.7	15
18	49.11	25	57.7	2	50.99	24	54.2	12
28	49.36	26	57.9	1	51.23	25	53.0	8
Sept. 7	49.62	28	58.0	0	51.48	27	52.2	5
17	49.90	29	58.0	3	51.75	28	51.7	1
27	50.19	29	57.7	4	52.03	29	51.6	5
Oct. 7	50.48	30	57.3	5	52.32	29	52.1	8
17	50.78	29	56.8	7	52.61	28	52.9	13
27	51.07	29	56.1	8	52.89	27	54.2	16
Nov. 6	51.36	28	55.3	9	53.16	26	55.8	20
16	51.64	25	54.4	10	53.42	24	57.8	21
26	51.89	23	53.4	9	53.66	20	59.9	25
Dec. 6	52.12	20	52.5	9	53.86	17	62.4	25
16	52.32	15	51.6	9	54.03	13	64.9	25
26	52.47	11	50.7	7	54.16	8	67.4	25
36	52.58		50.0		54.24		69.9	
Mittl. Ort	47.35		64.9		49.90		53.8	
			110)				564)	

1902	18 Monocerot. 5ᵐ.0. AR.		Decl. +		ϑ Geminorum. 3ᵐ.3. AR.		Decl. +	
	6ʰ 42ᵐ		2° 30′		6ʰ 46ᵐ		34° 4′	
Jan. 0	47.15	8	60.4	13	22.37	11	37.3	6
10	47.23	3	59.1	12	22.48	5	37.9	7
20	47.26	1	57.9	10	22.53	1	38.6	7
30	47.25	6	56.9	9	22.52	6	39.3	8
Febr. 9	47.19	10	56.0	7	22.46	11	40.1	7
19	47.09	14	55.3	5	22.35	16	40.8	7
März 1	46.95	16	54.8	3	22.19	19	41.5	5
11	46.79	17	54.5	1	22.00	20	42.0	3
21	46.62	19	54.4	0	21.80	22	42.3	2
31	46.43	18	54.4	1	21.58	21	42.5	1
April 10	46.25	16	54.5	3	21.37	20	42.6	2
20	46.09	14	54.8	4	21.17	18	42.4	3
30	45.95	12	55.2	6	20.99	13	42.1	5
Mai 10	45.83	8	55.8	7	20.86	10	41.6	6
20	45.75	4	56.5	8	20.76	5	41.0	7
30	45.71	1	57.3	9	20.71	1	40.3	7
Juni 9	45.70	4	58.2	10	20.70	4	39.6	8
19	45.74	7	59.2	11	20.74	9	38.8	7
29	45.81	12	60.3	12	20.83	15	38.1	8
Juli 9	[2] 45.93	14	61.5	11	[3] 20.98	17	37.3	8
19	46.07	17	62.6	10	21.15	21	36.5	7
29	46.24	20	63.6	9	21.36	24	35.8	6
Aug. 8	46.44	21	64.5	8	21.60	26	35.2	7
18	46.65	24	65.3	7	21.86	29	34.5	6
28	46.89	26	66.0	4	22.15	31	33.9	5
Sept. 7	47.15	26	66.4	1	22.46	33	33.4	6
17	47.41	28	66.5	1	22.79	33	32.8	5
27	47.69	28	66.4	4	23.12	35	32.3	4
Oct. 7	47.97	29	66.0	6	23.47	35	31.9	4
17	48.26	29	65.4	9	23.82	34	31.5	3
27	48.55	27	64.5	12	24.16	34	31.2	3
Nov. 6	48.82	27	63.3	13	24.50	33	30.9	1
16	49.09	25	62.0	14	24.83	30	30.8	0
26	49.34	22	60.6	15	25.13	28	30.8	2
Dec. 6	49.56	19	59.1	15	25.41	23	31.0	3
16	49.75	15	57.6	14	25.64	19	31.3	4
26	49.90	10	56.2	14	25.83	14	31.7	6
36	50.00		54.8		25.97		32.3	
Mittl. Ort	45.06		70.1		19.87		47.3	
			392)				112)	

*) Ort des Hauptsterns; die jährliche Parallaxe ist bereits angebracht.

1902	15 Lyncis. $4^m.7$.				ϑ Canis maj. $4^m.3$.				ε Canis maj. $1^m.6$.				ζ Gemin. $3.7...4^m.5$.			
	AR.		Decl. +		AR.		Decl. −		AR.		Decl. −		AR.		Decl. +	
	$6^h\ 48^m$		58° 32′		$6^h\ 49^m$		11° 54′		$6^h\ 54^m$		28° 50′		$6^h\ 58^m$		20° 42′	
Jan. 0	51.25	15	55.5	21	40.25	7	66.2	21	48.58	6	27.9	30	20.06	11	40.9	2
10	51.40	6	57.6	20	40.32	3	68.3	20	48.64	2	30.9	28	20.17	6	40.7	1
20	51.46	4	59.6	21	40.35	2	70.3	18	48.66	4	33.7	25	20.23	1	40.6	0
30	51.42	12	61.7	19	40.33	6	72.1	15	48.62	9	36.2	22	20.24	4	40.6	1
Febr. 9	51.30	20	63.6	17	40.27	11	73.6	13	48.53	13	38.4	19	20.20	9	40.7	1
19	51.10	26	65.3	14	40.16	14	74.9	10	48.40	17	40.3	16	20.11	14	40.8	2
März 1	50.84	32	66.7	10	40.02	17	75.9	7	48.23	20	41.9	11	19.97	16	41.0	2
11	50.52	35	67.7	7	39.85	18	76.6	4	48.03	22	43.0	7	19.81	18	41.2	2
21	50.17	36	68.4	3	39.67	20	77.0	1	47.81	22	43.7	4	19.63	18	41.4	2
31	49.81	36	68.7	1	39.47	18	77.1	1	47.59	22	44.1	1	19.45	19	41.6	1
April 10	49.45	34	68.6	5	39.29	18	77.0	5	47.37	22	44.0	5	19.26	18	41.7	1
20	49.11	30	68.1	8	39.11	16	76.5	7	47.15	19	43.5	9	19.08	15	41.8	0
30	48.81	25	67.3	13	38.95	13	75.8	9	46.96	16	42.6	13	18.93	13	41.8	0
Mai 10	48.56	18	66.0	15	38.82	9	74.9	11	46.80	13	41.3	15	18.80	9	41.8	0
20	48.38	12	64.5	17	38.73	6	73.8	14	46.67	9	39.8	19	18.71	5	41.8	0
30	48.26	5	62.8	20	38.67	3	72.4	15	46.58	6	37.9	22	18.66	1	41.8	0
Juni 9	48.21	2	60.8	20	38.64	2	70.9	17	46.52	1	35.7	23	18.65	2	41.8	1
19	48.23	10	58.8	20	38.66	5	69.2	18	46.51	3	33.4	24	18.67	7	41.7	0
29	48.33	19	56.8	23	38.71	10	67.4	20	46.54	8	31.0	28	18.74	12	41.7	0
Juli 9	^{3}48.52	24	54.5	21	^{3}38.81	13	65.4	18	^{5}46.62	11	28.2	26	^{5}18.86	14	41.7	0
19	48.76	30	52.4	19	38.94	15	63.6	18	46.73	15	25.6	24	19.00	18	41.7	0
29	49.06	35	50.5	18	39.09	19	61.8	16	46.88	18	23.2	23	19.18	20	41.7	0
Aug. 8	49.41	40	48.7	16	39.28	21	60.2	14	47.06	21	20.9	20	19.38	23	41.7	1
18	49.81	44	47.1	15	39.49	23	58.8	11	47.27	24	18.9	17	19.61	24	41.6	2
28	50.25	46	45.6	12	39.72	25	57.7	8	47.51	26	17.2	12	19.85	27	41.4	2
Sept. 7	50.71	50	44.4	11	39.97	26	56.9	5	47.77	28	16.0	9	20.12	28	41.2	4
17	51.21	52	43.3	7	40.23	27	56.4	1	48.05	29	15.1	3	20.40	30	40.8	4
27	51.73	53	42.6	5	40.50	29	56.3	3	48.34	31	14.8	2	20.70	30	40.4	5
Oct. 7	52.26	53	42.1	2	40.79	28	56.6	8	48.65	30	15.0	8	21.00	31	39.9	6
17	52.79	53	41.9	1	41.07	29	57.4	11	48.95	31	15.8	12	21.31	32	39.3	7
27	53.32	52	42.0	4	41.36	28	58.5	15	49.26	30	17.0	18	21.63	31	38.6	7
Nov. 6	53.84	49	42.4	8	41.64	26	60.0	18	49.56	28	18.8	21	21.94	29	37.9	7
16	54.33	45	43.2	10	41.90	25	61.8	20	49.84	26	20.9	25	22.23	28	37.2	7
26	54.78	40	44.2	14	42.15	22	63.8	21	50.10	22	23.4	28	22.51	26	36.5	6
Dec. 6	55.18	34	45.6	16	42.37	19	65.9	23	50.32	19	26.2	30	22.77	22	35.9	5
16	55.52	27	47.2	18	42.56	15	68.2	23	50.51	15	29.2	30	22.99	19	35.4	4
26	55.79	19	49.0	20	42.71	9	70.5	21	50.66	9	32.2	30	23.18	13	35.0	3
36	55.98		51.0		42.80		72.6		50.75		35.2		23.31		34.7	
Mittl. Ort	47.61		65.6		38.18		56.7		46.41		19.1		17.83		51.4	
	394)				565)				566)				113)			

1902	γ Canis maj. 4m.3.				δ Canis maj. 2m.0.				63 Aurigae. 5m.0.				λ Geminorum. 3m.8.			
	AR.		Decl. −		AR.		Decl. −		AR.		Decl. +		AR.		Decl. +	
	6h 59m		15° 29′		7h 4m		26° 14′		7h 4m		39° 28′		7h 12m		16° 42′	
Jan. 0	21.50		27.6		26.51		24.1		57.56		39.7		29.86		52.0	
10	21.58	8	30.0	24	26.59	8	27.0	29	57.69	13	40.5	8	29.98	12	51.4	6
20	21.62	4	32.2	22	26.62	3	29.7	27	57.77	8	41.5	10	30.05	7	51.0	4
30	21.61	1	34.2	20	26.59	3	32.2	25	57.78	1	42.6	11	30.07	2	50.8	2
Febr. 9	21.55	6	35.9	17	26.52	7	34.4	22	57.73	5	43.7	11	30.04	3	50.6	2
19	21.44	11	37.4	15	26.40	12	36.3	19	57.63	10	44.8	11	29.96	8	50.6	0
März 1	21.30	14	38.5	11	26.24	16	37.9	16	57.47	16	45.7	9	29.84	12	50.7	1
11	21.13	17	39.4	9	26.06	18	39.0	11	57.28	19	46.5	8	29.69	15	50.8	1
21	20.95	18	39.9	5	25.85	21	39.8	8	57.06	22	47.1	6	29.52	17	50.9	1
31	20.75	20	40.1	2	25.63	22	40.1	3	56.83	23	47.4	3	29.34	18	51.1	2
April 10	20.56	19	40.0	1	25.42	21	40.1	0	56.60	23	47.6	2	29.16	18	51.3	2
20	20.38	18	39.6	4	25.22	20	39.7	4	56.38	22	47.5	1	28.98	18	51.5	2
30	20.21	17	38.9	7	25.03	19	38.9	8	56.18	20	47.1	4	28.83	15	51.6	1
Mai 10	20.07	14	37.9	10	24.87	16	37.8	11	56.02	16	46.6	5	28.70	13	51.8	2
20	19.97	10	36.7	12	24.74	13	36.3	15	55.90	12	45.9	7	28.60	10	51.9	1
30	19.90	7	35.2	15	24.64	10	34.6	17	55.82	8	45.1	8	28.54	6	52.1	2
Juni 9	19.86	4	33.6	16	24.59	5	32.6	20	55.80	2	44.1	10	28.52	2	52.3	2
19	19.86	0	31.8	18	24.57	2	30.4	22	55.82	2	43.1	10	28.53	1	52.5	2
29	19.90	4	29.9	19	24.60	3	28.0	24	55.88	6	42.0	11	28.58	5	52.7	2
Juli 9	19.99	9	27.8	21	24.67	7	25.4	26	56.01	13	40.8	12	28.68	10	52.9	2
19	20.11	12	25.8	20	24.77	10	23.0	24	56.17	16	39.6	12	28.81	13	53.1	2
29	20.26	15	23.9	19	24.91	14	20.6	24	56.37	20	38.5	11	28.96	15	53.3	2
Aug. 8	20.43	17	22.1	18	25.08	17	18.4	22	56.61	24	37.5	10	29.15	19	53.4	1
18	20.63	20	20.6	15	25.28	20	16.5	19	56.88	27	36.5	10	29.36	21	53.4	0
28	20.85	22	19.3	13	25.51	23	14.9	16	57.17	29	35.5	10	29.59	23	53.3	1
Sept. 7	21.10	25	18.4	9	25.76	25	13.6	13	57.48	31	34.6	9	29.84	25	53.2	1
17	21.36	26	17.8	6	26.03	27	12.8	8	57.82	34	33.8	8	30.11	27	52.9	3
27	21.64	28	17.7	1	26.32	29	12.5	3	58.17	35	33.0	8	30.39	28	52.4	5
Oct. 7	21.92	28	18.0	3	26.62	30	12.6	1	58.54	37	32.4	6	30.69	30	51.9	5
17	22.21	29	18.7	7	26.92	30	13.3	7	58.91	37	31.8	6	30.99	30	51.2	7
27	22.50	29	19.8	11	27.22	30	14.5	12	59.29	38	31.4	4	31.30	31	50.3	9
Nov. 6	22.78	28	21.3	15	27.52	30	16.2	17	59.66	37	31.1	3	31.61	31	49.4	9
16	23.06	28	23.2	19	27.81	29	18.3	21	60.02	36	31.0	1	31.91	30	48.5	9
26	23.31	25	25.4	22	28.07	26	20.7	24	60.35	33	31.1	1	32.19	28	47.5	10
Dec. 6	23.54	23	27.7	23	28.30	23	23.4	27	60.66	31	31.4	3	32.45	26	46.6	9
16	23.73	19	30.1	24	28.50	20	26.3	29	60.94	28	31.9	5	32.67	22	45.8	8
26	23.89	16	32.5	24	28.66	16	29.2	29	61.16	22	32.7	8	32.86	19	45.1	7
36	23.99	10	34.9	24	28.76	10	32.1	29	61.32	16	33.5	8	33.01	15	44.5	6
Mittl. Ort	19.43		18.4		24.37		15.5		54.96		50.9		27.69		62.8	
	567)				568)				395)				114)			

1902	δ Geminorum. $3^m.3$				19 Lyncis seq. $5^m.1$				ι Geminorum. $4^m.0$				Gr. 1308. $6^m.0$			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	$7^h\ 14^m$		$22°\ 9'$		$7^h\ 14^m$		$55°\ 27'$		$7^h\ 19^m$		$27°\ 59'$		$7^h\ 20^m$		$68°\ 39'$	
Jan. 0	$18^s.46$		36″.0		$55^s.61$		46″.5		$40^s.75$		23″.5		$46^s.12$		44″.3	
		13		2		19		18		15		2		26		24
10	18.59		35.8		55.80		48.3		40.90		23.7		46.38		46.7	
		8		1		10		19		8		3		12		25
20	18.67		35.7	—	55.90		50.2		40.98		24.0		46.50		49.2	
		2		1		1		19		3		4		0		26
30	18.69	—	35.8		55.91	—	52.1		41.01	—	24.4		46.50		51.8	
		3		2		7		19		3		5		12		24
Febr. 9	18.66		36.0		55.84		54.0		40.98		24.9		46.38		54.2	
		7		2		14		18		7		5		24		23
19	18.59		36.2		55.70		55.8		40.91		25.4		46.14		56.5	
		12		3		21		15		12		6		35		19
März 1	18.47		36.5		55.49		57.3		40.79		26.0		45.79		58.4	
		16		3		27		13		16		5		43		16
11	18.31		36.8		55.22		58.6		40.63		26.5		45.36		60.0	
		18		3		30		10		18		4		49		12
21	18.13		37.1		54.92		59.6		40.45		26.9		44.87		61.2	
		18		2		33		6		20		4		52		8
31	17.95		37.3		54.59		60.2		40.25		27.3		44.35		62.0	
		19		2		33		2		20		2		53		2
April 10	17.76		37.5		54.26		60.4	—	40.05		27.5		43.82		62.2	—
		18		2		31		2		19		1		52		2
20	17.58		37.7		53.95		60.2		39.86		27.6		43.30		62.0	
		16		1		29		6		17		0		49		7
30	17.42		37.8		53.66		59.6		39.69		27.6		42.81		61.3	
		14		0		24		9		15		1		43		12
Mai 10	17.28		37.8		53.42		58.7		39.54		27.5		42.38		60.1	
		10		1		20		12		11		2		35		16
20	17.18		37.7		53.22		57.5		39.43		27.3		42.03		58.5	
		6		0		15		15		7		3		27		19
30	17.12		37.7		53.07		56.0		39.36		27.0		41.76		56.6	
		3		1		7		16		3		4		17		22
Juni 9	17.09	—	37.6		53.00		54.4		39.33	—	26.6		41.59		54.4	
		1		1		1		18		1		4		7		24
19	17.10		37.5		52.99	—	52.6		39.34		26.2		41.52	—	52.0	
		5		1		5		20		4		5		2		25
29	17.15		37.4		53.04		50.6		39.38		25.7		41.54		49.5	
		10		2		12		20		9		4		13		26
Juli 9	17.25		37.2		53.16		48.6		39.47		25.3		41.67		46.9	
		14		1		20		22		14		6		24		28
19	9 17.39		37.1		10 53.36		46.4		11 39.61		24.7		11 41.91		44.1	
		16		2		24		19		16		5		32		26
29	17.55		36.9		53.60		44.5		39.77		24.2		42.23		41.5	
		19		2		28		19		19		5		40		25
Aug. 8	17.74		36.7		53.88		42.6		39.96		23.7		42.63		39.0	
		22		2		34		18		22		6		48		23
18	17.96		36.5		54.22		40.8		40.18		23.1		43.11		36.7	
		24		3		37		16		25		6		55		21
28	18.20		36.2		54.59		39.2		40.43		22.5		43.66		34.6	
		26		4		41		15		27		6		60		18
Sept. 7	18.46		35.8		55.00		37.7		40.70		21.9		44.26		32.8	
		27		5		44		13		29		7		66		16
17	18.73		35.3		55.44		36.4		40.99		21.2		44.92		31.2	
		30		5		46		11		30		7		69		14
27	19.03		34.8		55.90		35.3		41.29		20.5		45.61		29.8	
		30		6		48		8		32		7		72		9
Oct. 7	19.33		34.2		56.38		34.5		41.61		19.8		46.33		28.9	
		31		7		50		6		33		8		75		6
17	19.64		33.5		56.88		33.9		41.94		19.0		47.08		28.3	
		32		8		49		3		34		7		75		2
27	19.96		32.7		57.37		33.6		42.28		18.3		47.83		28.1	—
		31		8		49		0		33		7		74		2
Nov. 6	20.27		31.9		57.86		33.6		42.61		17.6		48.57		28.3	
		31		8		48		4		32		6		71		6
16	20.58		31.1		58.34		34.0		42.93		17.0		49.28		28.9	
		30		7		45		6		31		5		67		11
26	20.88		30.4		58.79		34.6		43.24		16.5		49.95		30.0	
		27		6		41		9		29		4		60		14
Dec. 6	21.15		29.8		59.20		35.5		43.53		16.1		50.55		31.4	
		24		5		36		13		25		3		52		18
16	21.39		29.3		59.56		36.8		43.78		15.8		51.07		33.2	
		20		5		29		15		21		1		43		21
26	21.59		28.8		59.85		38.3		43.99		15.7	—	51.50		35.3	
		15		2		22		17		17		1		31		23
36	21.74		28.6		60.07		40.0		44.16		15.8		51.81		37.6	
Mittl. Ort	16.24		47.2		52.33		58.8		38.46		35.3		41.42		57.2	
		115)				397)				117)				116)		

1902	β Canis min. 3ᵐ.0. AR.	Δ	β Canis min. Decl. +	Δ	ρ Geminorum. 4ᵐ.8. AR.	Δ	ρ Geminorum. Decl. +	Δ	α Gemin. 2.3 u. 3ᵐ.3. AR.	Δ	α Gemin. Decl. +	Δ	25 Monocer. 5ᵐ.3. AR.	Δ	25 Monocer. Decl. −	Δ
	$7^h\ 21^m$		8° 28′		$7^h\ 22^m$		31° 58′		$7^h\ 28^m$		32° 5′		$7^h\ 32^m$		3° 53′	
Jan. 0	52.28		62.7		50.84		35.0		23.03		61.1		26.26		41.0	
10	52.40	12	61.7	10	51.00	16	35.4	4	23.19	16	61.5	4	26.38	12	42.8	18
20	52.48	8	60.8	9	51.09	9	35.9	5	23.29	10	62.0	5	26.46	8	44.5	17
30	52.50	2	60.0	8	51.12	3	36.6	7	23.33	4	62.7	7	26.48	2	46.0	15
Febr. 9	52.48	— 2	59.4	6	51.10	— 2	37.3	7	23.31	— 2	63.4	7	26.46	— 2	47.3	13
19	52.41	7	58.9	5	51.02	8	38.1	8	23.24	7	64.2	8	26.39	7	48.4	11
März 1	52.30	11	58.6	3	50.89	13	38.8	7	23.13	11	64.9	7	26.29	10	49.2	8
11	52.16	14	58.5	1	50.73	16	39.5	7	22.97	16	65.6	7	26.15	14	49.8	6
21	52.00	16	58.5	0	50.54	19	40.0	5	22.78	19	66.2	6	25.98	17	50.1	3
31	51.82	18	58.6	1	50.34	20	40.4	4	22.58	20	66.7	5	25.81	17	50.3	2
April 10	51.65	17	58.7	1	50.13	21	40.7	3	22.37	21	67.0	3	25.63	18	50.3	0
20	51.48	17	58.9	2	49.93	20	40.8	1	22.17	20	67.1	1	25.45	18	50.0	3
30	51.32	16	59.2	3	49.75	18	40.8	0	21.98	19	67.1	0	25.29	16	49.6	4
Mai 10	51.19	13	59.6	4	49.60	15	40.6	2	21.82	16	66.9	2	25.15	14	49.0	6
20	51.09	10	60.1	5	49.48	12	40.2	4	21.70	12	66.6	3	25.04	11	48.2	8
30	51.02	7	60.6	5	49.40	8	39.8	4	21.62	8	66.2	4	24.96	8	47.2	10
Juni 9	50.99	3	61.1	5	49.36	4	39.3	5	21.57	5	65.6	6	24.91	5	46.2	10
19	50.99	0	61.7	6	49.37	— 1	38.7	6	21.57	0	65.0	6	24.90	1	45.0	12
29	51.03	4	62.4	7	49.41	4	38.0	7	21.60	3	64.3	7	24.92	— 2	43.7	13
Juli 9	51.11	8	63.0	6	49.50	9	37.3	7	21.68	8	63.5	8	24.98	6	42.4	13
19	[11] 51.23	12	63.7	7	[11] 49.64	14	36.5	8	[13] 21.82	14	62.7	8	[14] 25.08	10	41.0	14
29	51.37	14	64.3	6	49.81	17	35.7	8	21.98	16	61.9	8	25.20	12	39.7	13
Aug. 8	51.54	17	64.9	6	50.01	20	34.9	8	22.17	19	61.1	8	25.35	15	38.6	11
18	51.73	19	65.3	4	50.24	23	34.1	8	22.39	22	60.3	8	25.53	18	37.6	10
28	51.94	21	65.5	2	50.49	25	33.3	8	22.64	25	59.5	8	25.74	21	36.8	8
Sept. 7	52.18	24	65.6	1	50.77	28	32.6	7	22.91	27	58.6	9	25.96	22	36.2	6
17	52.44	26	65.5	— 1	51.06	29	31.8	8	23.20	29	57.7	9	26.21	25	35.9	3
27	52.71	27	65.2	3	51.38	32	31.0	8	23.51	31	56.9	8	26.47	26	36.0	— 1
Oct. 7	52.99	28	64.7	5	51.71	33	30.2	8	23.84	33	56.1	8	26.75	28	36.4	4
17	53.28	29	64.0	7	52.05	34	29.4	8	24.18	34	55.2	9	27.03	28	37.1	7
27	53.58	30	63.0	10	52.39	34	28.7	7	24.52	34	54.5	7	27.33	30	38.1	10
Nov. 6	53.88	30	61.9	11	52.74	35	28.1	6	24.87	35	53.8	7	27.62	29	39.4	13
16	54.17	29	60.7	12	53.08	34	27.6	5	25.21	34	53.2	6	27.91	29	41.0	16
26	54.45	28	59.4	13	53.40	32	27.2	4	25.54	33	52.8	4	28.19	28	42.8	18
Dec. 6	54.70	25	58.0	14	53.70	30	27.0	2	25.85	31	52.5	3	28.44	25	44.6	18
16	54.93	23	56.7	13	53.97	27	27.0	0	26.12	27	52.5	0	28.67	23	46.6	20
26	55.12	19	55.5	12	54.19	22	27.1	1	26.35	23	52.6	1	28.86	19	48.5	19
36	55.27	15	54.3	12	54.37	18	27.4	3	26.53	18	52.9	3	29.01	15	50.4	19
Mittl. Ort	50.20		73.4		48.48		47.1		20.69		73.5		24.21		31.2	
	118)				398)				119)				569)			

1902	α Canis min.*) 1m.				24 Lyncis. 5m.1.				ϰ Geminorum. 3m.6.				β Geminorum. 1m.3.			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	7h 34m		5° 28′		7h 34m		58° 55′		7h 38m		24° 37′		7h 39m		28° 15′	
Jan. 0	12.43	13	23.4	13	46.55	23	69.4	19	34.11	16	47.0	2	21.45	16	34.5	1
10	12.56	8	22.1	12	46.78	14	71.3	21	34.27	11	46.8	1	21.61	11	34.6	3
20	12.64	4	20.9	10	46.92	4	73.4	21	34.38	5	46.9	2	21.72	5	34.9	4
30	12.68	2	19.9	8	46.96	4	75.5	21	34.43	1	47.1	3	21.77	1	35.3	5
Febr. 9	12.66	6	19.1	6	46.92	14	77.6	20	34.42	6	47.4	4	21.76	6	35.8	7
19	12.60	10	18.5	5	46.78	21	79.6	18	34.36	10	47.8	5	21.70	10	36.5	6
März 1	12.50	13	18.0	3	46.57	27	81.4	16	34.26	14	48.3	4	21.60	15	37.1	6
11	12.37	16	17.7	1	46.30	32	83.0	12	34.12	17	48.7	5	21.45	18	37.7	6
21	12.21	18	17.6	0	45.98	35	84.2	8	33.95	19	49.2	4	21.27	19	38.3	4
31	12.03	17	17.6	1	45.63	37	85.0	4	33.76	19	49.6	3	21.08	19	38.7	4
April 10	11.86	17	17.7	2	45.26	35	85.4	0	33.57	18	49.9	3	20.89	20	39.1	2
20	11.69	16	17.9	3	44.91	33	85.4	4	33.39	17	50.2	1	20.69	18	39.3	1
30	11.53	13	18.2	5	44.58	30	85.0	7	33.22	15	50.3	0	20.51	15	39.4	0
Mai 10	11.40	11	18.7	5	44.28	24	84.3	12	33.07	12	50.3	0	20.36	12	39.4	2
20	11.29	8	19.2	6	44.04	19	83.1	15	32.95	8	50.3	1	20.24	9	39.2	3
30	11.21	4	19.8	6	43.85	12	81.6	17	32.87	5	50.2	2	20.15	5	38.9	3
Juni 9	11.17	1	20.4	7	43.73	5	79.9	19	32.82	1	50.0	2	20.10	1	38.6	4
19	11.16	2	21.1	8	43.68	1	78.0	21	32.81	3	49.8	3	20.09	2	38.2	5
29	11.18	6	21.9	7	43.69	9	75.9	22	32.84	7	49.5	3	20.11	7	37.7	5
Juli 9	11.24	11	22.6	8	43.78	17	73.7	24	32.91	12	49.2	4	20.18	12	37.2	6
19	[14] 11.35	12	23.4	7	[14] 43.95	22	71.3	22	[15] 33.03	14	48.8	4	[16] 20.30	14	36.6	6
29	11.47	15	24.1	7	44.17	28	69.1	22	33.17	16	48.4	4	20.44	17	36.0	7
Aug. 8	11.62	18	24.8	5	44.45	33	66.9	21	33.33	20	48.0	5	20.61	20	35.3	7
18	11.80	21	25.3	3	44.78	38	64.8	19	33.53	23	47.5	6	20.81	23	34.6	7
28	12.01	22	25.6	2	45.16	42	62.9	18	33.76	25	46.9	6	21.04	26	33.9	8
Sept. 7	12.23	24	25.8	1	45.58	46	61.1	16	34.01	27	46.3	7	21.30	27	33.1	8
17	12.47	26	25.7	3	46.04	49	59.5	14	34.28	28	45.6	8	21.57	30	32.3	9
27	12.73	28	25.4	6	46.53	51	58.1	11	34.56	30	44.8	8	21.87	31	31.4	9
Oct. 7	13.01	29	24.8	8	47.04	53	57.0	9	34.86	32	44.0	9	22.18	32	30.5	9
17	13.30	29	24.0	11	47.57	54	56.1	5	35.18	33	43.1	9	22.50	34	29.6	8
27	13.59	30	22.9	12	48.11	54	55.6	2	35.51	33	42.2	9	22.84	33	28.8	9
Nov. 6	13.89	29	21.7	13	48.65	53	55.4	2	35.84	32	41.3	9	23.17	33	27.9	8
16	14.18	28	20.4	15	49.18	51	55.6	5	36.16	31	40.4	8	23.50	33	27.1	6
26	14.46	26	18.9	16	49.69	47	56.1	9	36.47	30	39.6	7	23.83	30	26.5	5
Dec. 6	14.72	23	17.3	15	50.16	41	57.0	12	36.77	26	38.9	5	24.13	27	26.0	4
16	14.95	20	15.8	15	50.57	34	58.2	15	37.03	22	38.4	4	24.40	23	25.6	2
26	15.15	16	14.3	14	50.91	27	59.7	18	37.25	18	38.0	2	24.63	19	25.4	0
36	15.31		12.9		51.18		61.5		37.43		37.8		24.82		25.4	
Mittl. Ort	10.34		34.9		43.14		83.4		31.92		59.3		19.21		47.2	
	120)				399)				121)				122)			

*) Die Angaben für α Canis min. beziehen sich hier auf den Ort des sichtbaren Sterns.

1902	π Geminorum. $6^m.0$.				Gr. 1374. $5^m.4$.				χ Geminorum. $5^m.0$.				27 Lyncis. $4^m.6$.			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	$7^h\ 41^m$		33° 39′		$7^h\ 48^m$		74° 10′		$7^h\ 57^m$		28° 3′		$8^h\ 1^m$		51° 46′	
Jan. 0	13.73	17	10.4	4	33.87	41	33.0	25	32.21	19	56.2	0	7.99	24	66.5	14
10	13.90	12	10.8	6	34.28	23	35.5	27	32.40	12	56.2	2	8.23	16	67.9	16
20	14.02	5	11.4	8	34.51	7	38.2	28	32.52	7	56.4	4	8.39	9	69.5	18
30	14.07	0	12.2	8	34.58	— 10	41.0	27	32.59	1	56.8	5	8.48	1	71.3	18
Febr. 9	14.07	7	13.0	9	34.48	26	43.7	26	32.60	— 4	57.3	7	8.49	— 7	73.1	19
19	14.00	11	13.9	9	34.22	40	46.3	23	32.56	9	58.0	6	8.42	13	75.0	17
März 1	13.89	15	14.8	8	33.82	53	48.6	20	32.47	13	58.6	7	8.29	20	76.7	15
11	13.74	18	15.6	7	33.29	63	50.6	16	32.34	16	59.3	6	8.09	24	78.2	14
21	13.56	21	16.3	6	32.66	68	52.2	11	32.18	18	59.9	6	7.85	27	79.6	10
31	13.35	21	16.9	4	31.98	72	53.3	6	32.00	20	60.5	5	7.58	29	80.6	7
April 10	13.14	20	17.3	2	31.26	72	53.9	0	31.80	19	61.0	3	7.29	29	81.3	3
20	12.94	19	17.5	1	30.54	69	53.9	4	31.61	18	61.3	2	7.00	28	81.6	0
30	12.75	16	17.6	— 2	29.85	63	53.5	10	31.43	16	61.5	1	6.72	25	81.6	4
Mai 10	12.59	14	17.4	3	29.22	56	52.5	14	31.27	13	61.6	— 1	6.47	21	81.2	7
20	12.45	10	17.1	4	28.66	45	51.1	19	31.14	10	61.5	1	6.26	17	80.5	10
30	12.35	5	16.7	6	28.21	34	49.2	22	31.04	6	61.4	3	6.09	12	79.5	12
Juni 9	12.30	1	16.1	7	27.87	21	47.0	24	30.98	3	61.1	4	5.97	7	78.3	15
19	12.29	— 2	15.4	8	27.66	9	44.6	27	30.95	— 2	60.7	5	5.90	1	76.8	17
29	12.31	7	14.6	8	27.57	— 4	41.9	28	30.97	5	60.2	5	5.89	— 4	75.1	18
Juli 9	12.38	12	13.8	10	27.61	20	39.1	32	31.02	9	59.7	6	5.93	10	73.3	19
19	[16] 12.50	15	12.8	9	[18] 27.81	30	35.9	29	31.11	13	59.1	7	6.03	17	71.4	22
29	12.65	18	11.9	10	28.11	42	33.0	28	[20] 31.24	16	58.4	7	[21] 6.20	20	69.2	20
Aug. 8	12.83	21	10.9	9	28.53	53	30.2	27	31.40	18	57.7	8	6.40	24	67.2	20
18	13.04	24	10.0	10	29.06	64	27.5	26	31.58	21	56.9	8	6.64	29	65.2	19
28	13.28	27	9.0	10	29.70	72	24.9	23	31.79	24	56.1	9	6.93	32	63.3	18
Sept. 7	13.55	29	8.0	10	30.42	80	22.6	20	32.03	26	55.2	9	7.25	36	61.5	17
17	13.84	31	7.0	10	31.22	86	20.6	17	32.29	29	54.3	10	7.61	39	59.8	16
27	14.15	33	6.0	10	32.08	92	18.9	14	32.58	30	53.3	11	8.00	42	58.2	14
Oct. 7	14.48	34	5.0	9	33.00	95	17.5	10	32.88	32	52.2	10	8.42	44	56.8	12
17	14.82	36	4.1	9	33.95	97	16.5	6	33.20	34	51.2	11	8.86	46	55.6	10
27	15.18	35	3.2	8	34.92	98	15.9	1	33.54	34	50.1	10	9.32	46	54.6	7
Nov. 6	15.53	35	2.4	6	35.90	95	15.8	— 4	33.88	33	49.1	9	9.78	46	53.9	4
16	15.88	34	1.8	5	36.85	90	16.2	9	34.21	33	48.2	8	10.24	45	53.5	0
26	16.22	32	1.3	3	37.75	84	17.1	12	34.54	32	47.4	7	10.69	43	53.5	3
Dec. 6	16.54	28	1.0	0	38.59	75	18.3	17	34.86	28	46.7	5	11.12	38	53.8	6
16	16.82	25	1.0	1	39.34	62	20.0	21	35.14	25	46.2	2	11.50	33	54.4	10
26	17.07	20	1.1	3	39.96	48	22.1	24	35.39	21	46.0	1	11.83	28	55.4	13
36	17.27		1.4		40.44		24.5		35.60		45.9		12.11		56.7	
Mittl. Ort	11.40		23.6		28.23		48.4		30.04		69.6		5.20		82.1	
	400)				401)				404)				405)			

1902	ι Navis. 3ᵐ.0. AR.		Decl. −		Br. 1147. 5ᵐ.1. AR.		Decl. +		20 Navis. 6ᵐ.0. AR.		Decl. −		β Cancri. 3ᵐ.6. AR.		Decl. +	
	8ʰ 3ᵐ		24° 1′		8ʰ 7ᵐ		76° 2′		8ʰ 8ᵐ		15° 29′		8ʰ 11ᵐ		9° 28′	
Jan. 0	24.27	15	25.2	29	20.39	51	66.0	25	51.72	15	43.2	26	14.04	17	64.3	12
10	24.42	10	28.1	28	20.90	33	68.5	27	51.87	11	45.8	24	14.21	12	63.1	10
20	24.52	5	30.9	26	21.23	14	71.2	28	51.98	5	48.2	22	14.33	8	62.1	8
30	24.57	1	33.5	24	21.37	5	74.0	28	52.03	1	50.4	20	14.41	2	61.3	6
Febr. 9	24.56	5	35.9	22	21.32	24	76.8	28	52.04	4	52.4	17	14.43	2	60.7	4
19	24.51	10	38.1	18	21.08	40	79.6	25	52.00	9	54.1	15	14.41	7	60.3	2
März 1	24.41	14	39.9	15	20.68	55	82.1	22	51.91	12	55.6	12	14.34	11	60.1	1
11	24.27	17	41.4	11	20.13	67	84.3	18	51.79	15	56.8	9	14.23	14	60.0	1
21	24.10	19	42.5	7	19.46	75	86.1	13	51.64	17	57.7	5	14.09	16	60.1	1
31	23.91	20	43.2	4	18.71	81	87.4	9	51.47	19	58.2	3	13.93	17	60.2	2
April 10	23.71	20	43.6	0	17.90	82	88.3	3	51.28	18	58.5	1	13.76	16	60.4	3
20	23.51	19	43.6	3	17.08	80	88.6	3	51.10	17	58.4	3	13.60	16	60.7	4
30	23.32	18	43.3	7	16.28	75	88.3	8	50.93	16	58.1	6	13.44	15	61.1	4
Mai 10	23.14	15	42.6	10	15.53	68	87.5	13	50.77	13	57.5	9	13.29	12	61.5	4
20	22.99	13	41.6	13	14.85	57	86.2	17	50.64	11	56.6	11	13.17	9	61.9	5
30	22.86	9	40.3	16	14.28	46	84.5	21	50.53	8	55.5	13	13.08	7	62.4	5
Juni 9	22.77	6	38.7	18	13.82	32	82.4	24	50.45	5	54.2	15	13.01	4	62.9	5
19	22.71	3	36.9	20	13.50	18	80.0	26	50.40	2	52.7	17	12.97	0	63.4	5
29	22.68	1	34.9	21	13.32	4	77.4	29	50.38	1	51.0	17	12.97	3	63.9	5
Juli 9	22.69	5	32.8	21	13.28	11	74.5	30	50.39	5	49.3	18	13.00	7	64.4	4
19	22.74	9	30.7	24	13.39	28	71.5	33	50.44	9	47.5	19	13.07	10	64.8	5
29	[22] 22.83	12	28.3	21	[22] 13.67	40	68.2	30	[23] 50.53	11	45.6	17	[24] 13.17	12	65.3	3
Aug. 8	22.95	15	26.2	19	14.07	52	65.2	29	50.64	15	43.9	15	13.29	15	65.6	2
18	23.10	19	24.3	17	14.59	64	62.3	27	50.79	17	42.4	13	13.44	18	65.8	1
28	23.29	21	22.6	14	15.23	75	59.6	26	50.96	19	41.1	11	13.62	20	65.9	1
Sept. 7	23.50	23	21.2	10	15.98	85	57.0	23	51.15	22	40.0	7	13.82	23	65.8	3
17	23.73	26	20.2	6	16.83	93	54.7	20	51.37	25	39.3	3	14.05	25	65.5	5
27	23.99	27	19.6	1	17.76	100	52.7	16	51.62	27	39.0	1	14.30	26	65.0	7
Oct. 7	24.26	29	19.5	4	18.76	105	51.1	13	51.89	28	39.1	5	14.56	29	64.3	9
17	24.55	30	19.9	9	19.81	109	49.8	8	52.17	29	39.6	9	14.85	30	63.4	11
27	24.85	31	20.8	14	20.90	109	49.0	4	52.46	31	40.5	14	15.15	30	62.3	13
Nov. 6	25.16	30	22.2	18	21.99	109	48.6	1	52.77	30	41.9	17	15.45	31	61.0	14
16	25.46	30	24.0	22	23.08	103	48.7	6	53.07	30	43.6	20	15.76	30	59.6	15
26	25.76	27	26.2	25	24.11	97	49.3	11	53.37	27	45.6	23	16.06	29	58.1	15
Dec. 6	26.03	25	28.7	27	25.08	88	50.4	16	53.64	25	47.9	25	16.35	26	56.6	14
16	26.28	22	31.4	29	25.96	75	52.0	20	53.89	22	50.4	25	16.61	23	55.2	14
26	26.50	17	34.3	29	26.71	60	54.0	23	54.11	18	52.9	25	16.84	20	53.8	12
36	26.67		37.2		27.31		56.3		54.29		55.4		17.04		52.6	
Mittl. Ort	22.19		18.2		14.46		82.9		49.70		35.2		12.06		75.9	
	570)				406)				571)				123)			

1902	31 Lyncis. 5m.0. AR.		Decl. +		Br. 1197. 3m.6. AR.		Decl. —		o Ursae maj. 3m.3. AR.		Decl. +		Gr. 1450. 6m.4. AR.		Decl. +	
	8h 16m		43° 29′		8h 20m		3° 35′		8h 22m		61° 2′		8h 26m		38° 20′	
Jan. 0	10.23	23	53.7	8	47.74	18	20.7	20	10.77	32	28.1	18	34.93	24	52.4	5
10	10.46	17	54.5	11	47.92	12	22.7	18	11.09	23	29.9	20	35.17	17	52.9	7
20	10.63	10	55.6	13	48.04	8	24.5	16	11.32	14	31.9	22	35.34	10	53.6	9
30	10.73	4	56.9	14	48.12	2	26.1	14	11.46	3	34.1	23	35.44	5	54.5	12
Febr. 9	10.77	— 3	58.3	15	48.14	— 2	27.5	11	11.49	— 6	36.4	23	35.49	— 1	55.7	12
19	10.74	10	59.8	14	48.12	7	28.6	9	11.43	15	38.7	21	35.48	8	56.9	13
März 1	10.64	15	61.2	14	48.05	10	29.5	7	11.28	23	40.8	20	35.40	12	58.2	12
11	10.49	19	62.6	12	47.95	13	30.2	5	11.05	29	42.8	18	35.28	16	59.4	11
21	10.30	21	63.8	10	47.82	16	30.7	3	10.76	34	44.6	13	35.12	20	60.5	10
31	10.09	23	64.8	8	47.66	17	31.0	0	10.42	37	45.9	10	34.92	21	61.5	8
April 10	9.86	24	65.6	5	47.49	16	31.0	2	10.05	38	46.9	5	34.71	21	62.3	6
20	9.62	23	66.1	2	47.33	16	30.8	4	9.67	37	47.4	1	34.50	21	62.9	3
30	9.39	21	66.3	— 1	47.17	15	30.4	5	9.30	35	47.5	— 3	34.29	20	63.2	1
Mai 10	9.18	19	66.2	3	47.02	13	29.9	6	8.95	31	47.2	7	34.09	17	63.3	— 2
20	8.99	14	65.9	6	46.89	10	29.3	8	8.64	27	46.5	11	33.92	14	63.1	4
30	8.85	11	65.3	9	46.79	7	28.5	9	8.37	20	45.4	15	33.78	10	62.7	6
Juni 9	8.74	6	64.4	11	46.72	5	27.6	10	8.17	14	43.9	18	33.68	6	62.1	8
19	8.68	2	63.3	12	46.67	1	26.6	11	8.03	8	42.1	20	33.62	2	61.3	9
29	8.66	— 3	62.1	14	46.66	— 1	25.5	12	7.95	0	40.1	22	33.60	— 1	60.4	11
Juli 9	8.69	7	60.7	15	46.67	4	24.3	12	7.95	6	37.9	24	33.61	6	59.3	13
19	8.76	13	59.2	17	46.71	9	23.1	12	8.01	14	35.5	27	33.67	11	58.0	14
29	[25] 8.89	16	57.5	16	[26] 46.80	11	21.9	11	[26] 8.15	20	32.8	25	[27] 33.78	14	56.6	14
Aug. 8	9.05	19	55.9	17	46.91	13	20.8	9	8.35	26	30.3	25	33.92	17	55.2	15
18	9.24	23	54.2	17	47.04	16	19.9	7	8.61	32	27.8	25	34.09	20	53.7	15
28	9.47	27	52.5	17	47.20	19	19.2	5	8.93	37	25.3	23	34.29	24	52.2	15
Sept. 7	9.74	30	50.8	16	47.39	21	18.7	2	9.30	42	23.0	22	34.53	27	50.7	15
17	10.04	32	49.2	15	47.60	24	18.5	— 1	9.72	46	20.8	20	34.80	29	49.2	15
27	10.36	36	47.7	15	47.84	26	18.6	4	10.18	50	18.8	18	35.09	32	47.7	15
Oct. 7	10.72	38	46.2	13	48.10	27	19.0	7	10.68	54	17.0	15	35.41	35	46.2	14
17	11.10	39	44.9	12	48.37	29	19.7	10	11.22	56	15.5	12	35.76	36	44.8	13
27	11.49	40	43.7	10	48.66	30	20.7	14	11.78	58	14.3	8	36.12	37	43.5	12
Nov. 6	11.89	40	42.7	8	48.96	30	22.1	16	12.36	57	13.5	4	36.49	38	42.3	10
16	12.29	40	41.9	5	49.26	30	23.7	18	12.93	57	13.1	1	36.87	38	41.3	7
26	12.69	38	41.4	2	49.56	28	25.5	19	13.50	54	13.0	— 4	37.25	36	40.6	5
Dec. 6	13.07	36	41.2	— 1	49.84	26	27.4	20	14.04	49	13.4	8	37.61	34	40.1	2
16	13.43	31	41.3	5	50.10	23	29.4	20	14.53	44	14.2	13	37.95	30	39.9	0
26	13.74	26	41.8	7	50.33	19	31.4	20	14.97	36	15.5	15	38.25	26	39.9	4
36	14.00		42.5		50.52		33.4		15.33		17.0		38.51		40.3	
Mittl. Ort	7.83		69.5		45.80		11.1		7.60		45.7		32.72		68.2	
	407)				124)				125)				408)			

1902	η Cancri. 5m.8. AR.	Δ	Decl. +	Δ	δ Cancri. 4m.0. AR.	Δ	Decl. +	Δ	ι Cancri. 4m.1. AR.	Δ	Decl. +	Δ	ζ Hydrae. 3m.3. AR.	Δ	Decl. +	Δ
	8h 27m		20° 46′		8h 39m		18° 30′		8h 40m		29° 6′		8h 50m		6° 18′	
Jan. 0	4.56 s	20	13.9″	6	8.92 s	21	39.6″	8	48.15 s	22	52.1″	1	14.70 s	21	56.0″	15
10	4.76	15	13.3	4	9.13	16	38.8	5	48.37	17	52.0	— 1	14.91	15	54.5	13
20	4.91	10	12.9	1	9.29	10	38.3	3	48.54	12	52.1	4	15.06	11	53.2	11
30	5.01	4	12.8	— 1	9.39	6	38.0	1	48.66	7	52.5	5	15.17	6	52.1	8
Febr. 9	5.05	— 1	12.9	2	9.45	0	37.9	— 1	48.73	0	53.0	7	15.23	1	51.3	7
19	5.04	5	13.1	3	9.45	5	38.0	2	48.73	5	53.7	9	15.24	— 3	50.6	4
März 1	4.99	10	13.4	5	9.40	9	38.2	4	48.68	10	54.6	9	15.21	8	50.2	2
11	4.89	14	13.9	5	9.31	12	38.6	5	48.58	13	55.5	9	15.13	11	50.0	1
21	4.75	16	14.4	5	9.19	15	39.1	4	48.45	16	56.4	8	15.02	14	49.9	— 1
31	4.59	17	14.9	5	9.04	16	39.5	5	48.29	18	57.2	7	14.88	15	50.0	2
April 10	4.42	17	15.4	5	8.88	17	40.0	5	48.11	19	57.9	6	14.73	15	50.2	3
20	4.25	17	15.9	4	8.71	16	40.5	4	47.92	18	58.5	4	14.58	16	50.5	4
30	4.08	16	16.3	3	8.55	16	40.9	4	47.74	17	58.9	3	14.42	15	50.9	4
Mai 10	3.92	13	16.6	2	8.39	13	41.3	3	47.57	15	59.2	2	14.27	13	51.3	5
20	3.79	11	16.8	2	8.26	11	41.6	3	47.42	12	59.4	0	14.14	11	51.8	5
30	3.68	8	17.0	1	8.15	9	41.9	2	47.30	10	59.4	2	14.03	9	52.3	6
Juni 9	3.60	4	17.1	0	8.06	5	42.1	1	47.20	6	59.2	3	13.94	6	52.9	7
19	3.56	2	17.1	1	8.01	3	42.2	0	47.14	3	58.9	5	13.88	3	53.6	6
29	3.54	— 2	17.0	1	7.98	— 1	42.2	0	47.11	— 1	58.4	6	13.85	0	54.2	6
Juli 9	3.56	6	16.9	2	7.99	4	42.2	1	47.12	4	57.8	7	13.85	2	54.8	6
19	3.62	9	16.7	3	8.03	7	42.1	2	47.16	7	57.1	8	13.87	6	55.4	5
29	[28] 3.71	12	16.4	4	8.10	11	41.9	3	47.23	12	56.3	10	13.93	9	55.9	4
Aug. 8	3.83	15	16.0	5	[31] 8.21	14	41.6	4	[31] 47.35	14	55.3	10	[2] 14.02	11	56.3	3
18	3.98	17	15.5	6	8.35	16	41.2	5	47.49	17	54.3	11	14.13	14	56.6	2
28	4.15	20	14.9	7	8.51	18	40.7	7	47.66	20	53.2	12	14.27	17	56.8	— 1
Sept. 7	4.35	23	14.2	8	8.69	22	40.0	8	47.86	23	52.0	12	14.44	19	56.7	2
17	4.58	25	13.4	9	8.91	24	39.2	9	48.09	26	50.8	13	14.63	22	56.5	5
27	4.83	27	12.5	11	9.15	26	38.3	11	48.35	28	49.5	14	14.85	25	56.0	7
Oct. 7	5.10	30	11.4	11	9.41	29	37.2	12	48.63	31	48.1	14	15.10	27	55.3	10
17	5.40	31	10.3	13	9.70	30	36.0	13	48.94	33	46.7	14	15.37	29	54.3	12
27	5.71	32	9.0	13	10.00	32	34.7	14	49.27	34	45.3	14	15.66	30	53.1	14
Nov. 6	6.03	33	7.7	13	10.32	32	33.3	14	49.61	35	43.9	13	15.96	31	51.7	16
16	6.36	32	6.4	12	10.64	33	31.9	14	49.96	34	42.6	11	16.27	31	50.1	17
26	6.68	31	5.2	12	10.97	31	30.5	13	50.30	34	41.5	9	16.58	30	48.4	17
Dec. 6	6.99	29	4.0	10	11.28	29	29.2	12	50.64	32	40.6	8	16.88	28	46.7	17
16	7.28	26	3.0	9	11.57	27	28.0	10	50.96	29	39.8	5	17.16	26	45.0	16
26	7.54	22	2.1	7	11.84	23	27.0	8	51.25	24	39.3	2	17.42	23	43.4	16
36	7.76		1.4		12.07		26.2		51.49		39.1		17.65		41.8	
Mittl. Ort	2.58		27.3		6.99		53.0		46.14		67.2		12.85		67.3	
	409)				126)				127)				129)			

1902	ι Ursae maj. 3m.0 AR.	Δ	Decl. +	Δ	α Cancri. 4m.0 AR.	Δ	Decl. +	Δ
	8h 52m		48° 25′		8h 53m		12° 13′	
Jan. 0	32.40	29	17.5	8	9.52	21	61.7	12
10	32.69	22	18.3	12	9.73	17	60.5	9
20	32.91	16	19.5	15	9.90	12	59.6	7
30	33.07	9	21.0	16	10.02	6	58.9	5
Febr. 9	33.16	1	22.6	19	10.08	1	58.4	3
19	33.17	7	24.5	18	10.09	3	58.1	1
März 1	33.10	12	26.3	17	10.06	7	58.0	1
11	32.98	17	28.0	17	9.99	11	58.1	2
21	32.81	22	29.7	14	9.88	14	58.3	3
31	32.59	24	31.1	11	9.74	15	58.6	3
April 10	32.35	26	32.2	9	9.59	16	58.9	5
20	32.09	25	33.1	5	9.43	16	59.4	4
30	31.84	24	33.6	2	9.27	15	59.8	5
Mai 10	31.60	23	33.8	2	9.12	13	60.3	4
20	31.37	19	33.6	5	8.99	11	60.7	4
30	31.18	16	33.1	7	8.88	9	61.1	4
Juni 9	31.02	12	32.4	11	8.79	6	61.5	4
19	30.90	7	31.3	14	8.73	4	61.9	4
29	30.83	2	29.9	15	8.69	0	62.3	3
Juli 9	30.81	2	28.4	18	8.69	3	62.6	2
19	30.83	6	26.6	19	8.72	5	62.8	2
29	30.89	12	24.7	22	8.77	9	63.0	1
Aug. 8	31.01	16	22.5	21	8.86	11	63.1	1
18	31.17	20	20.4	21	8.97	15	63.0	2
28	31.37	24	18.3	21	9.12	17	62.8	4
Sept. 7	31.61	28	16.2	21	9.29	19	62.4	5
17	31.89	31	14.1	20	9.48	23	61.9	8
27	32.20	35	12.1	20	9.71	25	61.1	9
Oct. 7	32.55	39	10.1	18	9.96	27	60.2	11
17	32.94	41	8.3	16	10.23	29	59.1	13
27	33.35	42	6.7	13	10.52	30	57.8	15
Nov. 6	33.77	44	5.4	11	10.82	32	56.3	15
16	34.21	43	4.3	8	11.14	32	54.8	16
26	34.64	43	3.5	4	11.46	31	53.2	15
Dec. 6	35.07	41	3.1	1	11.77	29	51.7	15
16	35.48	37	3.0	4	12.06	27	50.2	14
26	35.85	32	3.4	7	12.33	23	48.8	13
36	36.17		4.1		12.56		47.5	
Mittl. Ort	30.11		35.7		7.67		74.2	
	130)				131)			

1902	10 Ursae maj. 4m.0 AR.	Δ	Decl. +	Δ	κ Ursae maj. 3m.3 AR.	Δ	Decl. +	Δ
	8h 54m		42° 9′		8h 56m		47° 32′	
Jan. 0	18.97	27	57.6	5	58.53	29	20.7	8
10	19.24	22	58.1	8	58.82	24	21.5	11
20	19.46	14	58.9	12	59.06	16	22.6	15
30	19.60	8	60.1	13	59.22	9	24.1	16
Febr. 9	19.68	2	61.4	14	59.31	2	25.7	17
19	19.70	5	62.8	15	59.33	5	27.4	18
März 1	19.65	10	64.3	15	59.28	12	29.2	17
11	19.55	15	65.8	15	59.16	16	30.9	17
21	19.40	19	67.3	13	59.00	21	32.6	14
31	19.21	21	68.6	11	58.79	23	34.0	12
April 10	19.00	22	69.7	8	58.56	25	35.2	9
20	18.78	23	70.5	5	58.31	25	36.1	6
30	18.55	21	71.0	3	58.06	24	36.7	2
Mai 10	18.34	19	71.3	0	57.82	22	36.9	1
20	18.15	17	71.3	3	57.60	19	36.8	4
30	17.98	13	71.0	6	57.41	15	36.4	8
Juni 9	17.85	10	70.4	8	57.26	12	35.6	10
19	17.75	6	69.6	11	57.14	8	34.6	12
29	17.69	2	68.5	12	57.06	3	33.4	15
Juli 9	17.67	2	67.3	14	57.03	2	31.9	17
19	17.69	6	65.9	16	57.05	6	30.2	18
29	17.75	12	64.3	18	57.11	11	28.4	22
Aug. 8	17.87	14	62.5	18	57.22	15	26.2	20
18	18.01	17	60.7	18	57.37	19	24.2	21
28	18.18	22	58.9	19	57.56	23	22.1	21
Sept. 7	18.40	25	57.0	19	57.79	27	20.0	21
17	18.65	29	55.1	19	58.06	31	17.9	21
27	18.94	31	53.2	18	58.37	34	15.8	20
Oct. 7	19.25	35	51.4	17	58.71	37	13.8	18
17	19.60	37	49.7	16	59.08	41	12.0	17
27	19.97	39	48.1	15	59.49	42	10.3	14
Nov. 6	20.36	39	46.6	12	59.91	43	8.9	11
16	20.75	40	45.4	10	60.34	43	7.8	9
26	21.15	40	44.4	6	60.77	43	6.9	5
Dec. 6	21.55	37	43.8	3	61.20	40	6.4	1
16	21.92	34	43.5	0	61.60	37	6.3	3
26	22.26	29	43.5	4	61.97	32	6.6	6
36	22.55		43.9		62.29		7.2	
Mittl. Ort	16.85		75.1		56.30		39.0	
	132)				133)			

1902	σ^2 Ursae maj. $5^m.0$				ϑ Hydrae. $4^m.0$				83 Cancri. $5^m.8$				40 Lyncis. $3^m.3$			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	$9^h\ 1^m$		67° 31′		$9^h\ 9^m$		2° 43′		$9^h\ 13^m$		18° 6′		$9^h\ 15^m$		34° 47′	
Jan. 0	49.99		37.4		17.75		29.6		32.56		61.1		7.04		68.5	
10	50.46	47	39.1	17	17.96	21	27.9	17	32.80	24	60.2	9	7.31	27	68.5	0
20	50.83	37	41.2	21	18.14	18	26.3	16	32.99	19	59.5	7	7.53	22	68.9	4
30	51.07	24	43.5	23	18.27	13	25.0	13	33.13	14	59.1	4	7.70	17	69.5	6
Febr. 9	51.20	13	46.1	26	18.34	7	23.9	11	33.22	9	59.0	1	7.80	10	70.3	8
19	51.20	0	48.6	25	18.37	3	23.0	9	33.26	4	59.0	0	7.84	4	71.4	11
März 1	51.09	11	51.2	26	18.35	— 2	22.3	7	33.25	— 1	59.2	2	7.82	— 2	72.6	12
11	50.87	22	53.7	25	18.29	6	21.9	4	33.19	6	59.6	4	7.75	7	73.8	12
21	50.55	32	55.9	22	18.19	10	21.6	3	33.09	10	60.1	5	7.64	11	75.1	13
31	50.16	39	57.8	19	18.07	12	21.6	0	32.97	12	60.7	6	7.49	15	76.3	12
April 10	49.72	44	59.2	14	17.93	14	21.7	1	32.82	15	61.3	6	7.32	17	77.4	11
20	49.25	47	60.3	11	17.78	15	21.9	2	32.66	16	61.9	6	7.13	19	78.3	9
30	48.76	49	60.8	5	17.63	15	22.2	3	32.50	16	62.5	6	6.94	19	79.0	7
Mai 10	48.29	47	60.9	1	17.49	14	22.7	5	32.35	15	63.0	5	6.75	19	79.5	5
20	47.85	44	60.4	— 5	17.36	13	23.2	5	32.21	14	63.4	4	6.58	17	79.7	2
30	47.45	40	59.5	9	17.24	12	23.8	6	32.09	12	63.8	4	6.43	15	79.8	1
Juni 9	47.10	35	58.2	13	17.14	10	24.5	7	31.99	10	64.1	3	6.30	13	79.6	— 2
19	46.82	28	56.5	17	17.07	7	25.2	7	31.91	8	64.2	1	6.20	10	79.2	4
29	46.62	20	54.4	21	17.03	4	25.9	7	31.86	5	64.3	1	6.14	6	78.5	7
Juli 9	46.49	13	52.0	24	17.01	2	26.6	7	31.84	2	64.3	0	6.10	4	77.7	8
19	46.45	4	49.4	26	17.02	— 1	27.3	7	31.85	— 1	64.2	1	6.10	0	76.7	10
29	46.50	— 5	46.7	27	17.05	3	28.0	7	31.88	3	64.0	2	6.14	4	75.6	11
Aug. 8	[9]46.64	14	43.5	32	[7]17.12	7	28.7	7	[9]31.95	7	63.7	3	6.21	7	74.3	13
18	46.85	21	40.6	29	17.21	9	29.1	4	32.05	10	63.2	5	[9]6.33	12	72.8	15
28	47.14	29	37.7	29	17.33	12	29.4	3	32.18	13	62.6	6	6.47	14	71.2	16
Sept. 7	47.51	37	34.8	29	17.48	15	29.5	1	32.33	15	61.9	7	6.64	17	69.6	16
17	47.94	43	32.1	27	17.66	18	29.4	— 1	32.52	19	61.0	9	6.85	21	67.9	17
27	48.45	51	29.5	26	17.87	21	29.0	4	32.73	21	59.9	11	7.09	24	66.1	18
Oct. 7	49.01	56	27.2	23	18.10	23	28.4	6	32.97	24	58.7	12	7.36	27	64.3	18
17	49.62	61	25.2	20	18.35	25	27.5	9	33.24	27	57.3	14	7.66	30	62.6	17
27	50.28	66	23.5	17	18.63	28	26.3	12	33.53	29	55.9	14	7.99	33	60.8	18
Nov. 6	50.97	69	22.1	14	18.93	30	24.9	14	33.84	31	54.3	16	8.34	35	59.2	16
16	51.68	71	21.2	9	19.24	31	23.3	16	34.16	32	52.7	16	8.71	37	57.7	15
26	52.39	71	20.8	4	19.55	31	21.5	18	34.49	33	51.1	16	9.08	37	56.4	13
Dec. 6	53.08	69	20.9	— 1	19.86	31	19.6	19	34.81	32	49.6	15	9.44	36	55.3	11
16	53.73	65	21.5	6	20.15	29	17.7	19	35.12	31	48.2	14	9.79	35	54.5	8
26	54.32	59	22.5	10	20.42	27	15.9	18	35.41	29	47.0	12	10.12	33	54.0	5
36	54.84	52	24.1	16	20.66	24	14.1	18	35.67	26	46.0	10	10.41	29	53.9	1
Mittl. Ort	46.75		57.7		15.96		40.2		30.79		75.0		5.17		85.6	
	415)				134)				417)				136)			

1902	α Hydrae. 2m.0. AR.		Decl. −		h Ursae maj. 3m.3. AR.		Decl. +	
	9h 22m		8° 14′		9h 23m		63° 28′	
Jan. 0	48.07s	23	8.8″	23	51.05s	45	64.8″	13
10	48.30	18	11.1	21	51.50	36	66.1	17
20	48.48	13	13.2	20	51.86	27	67.8	21
30	48.61	9	15.2	18	52.13	17	69.9	24
Febr. 9	48.70	4	17.0	16	52.30	5	72.3	24
19	48.74	— 1	18.6	13	52.35	— 4	74.7	25
März 1	48.73	6	19.9	10	52.31	14	77.2	25
11	48.67	9	20.9	8	52.17	23	79.7	23
21	48.58	11	21.7	6	51.94	29	82.0	20
31	48.47	14	22.3	3	51.65	35	84.0	17
April 10	48.33	15	22.6	0	51.30	38	85.7	13
20	48.18	15	22.6	1	50.92	40	87.0	8
30	48.03	15	22.5	4	50.52	40	87.8	4
Mai 10	47.88	13	22.1	5	50.12	38	88.2	— 1
20	47.75	13	21.6	7	49.74	35	88.1	6
30	47.62	10	20.9	9	49.39	30	87.5	10
Juni 9	47.52	8	20.0	10	49.09	26	86.5	14
19	47.44	6	19.0	11	48.83	20	85.1	17
29	47.38	4	17.9	12	48.63	13	83.4	21
Juli 9	47.34	1	16.7	12	48.50	7	81.3	23
19	47.33	— 1	15.5	12	48.43	1	79.0	26
29	47.34	5	14.3	12	48.42	— 7	76.4	27
Aug. 8	47.39	8	13.1	12	48.49	15	73.7	31
18	[11] 47.47	10	11.9	9	[11] 48.64	21	70.6	29
28	47.57	13	11.0	7	48.85	27	67.7	29
Sept. 7	47.70	17	10.3	4	49.12	33	64.8	28
17	47.87	19	9.9	2	49.45	40	62.0	27
27	48.06	22	9.7	— 2	49.85	45	59.3	25
Oct. 7	48.28	25	9.9	6	50.30	51	56.8	23
17	48.53	28	10.5	9	50.81	55	54.5	20
27	48.81	29	11.4	13	51.36	58	52.5	17
Nov. 6	49.10	31	12.7	16	51.94	61	50.8	13
16	49.41	31	14.3	18	52.55	62	49.5	8
26	49.72	31	16.1	20	53.17	61	48.7	3
Dec. 6	50.03	30	18.1	22	53.78	59	48.4	— 1
16	50.33	27	20.3	23	54.37	54	48.5	7
26	50.60	25	22.6	22	54.91	49	49.2	11
36	50.85		24.8		55.40		50.3	
Mittl. Ort	46.30		1.0		48.45		86.0	
	138)				139)			

1902	d Ursae maj. 4m.6. AR.		Decl. +		ϑ Ursae maj. 3m.0. AR.		Decl. +	
	9h 25m		70° 15′		9h 26m		52° 6′	
Jan. 0	52.78s	57	19.2″	16	20.50s	34	66.0″	8
10	53.35	45	20.8	20	20.84	29	66.8	11
20	53.80	34	22.8	23	21.13	22	67.9	15
30	54.14	20	25.1	26	21.35	13	69.4	18
Febr. 9	54.34	6	27.7	28	21.48	6	71.2	20
19	54.40	— 7	30.5	27	21.54	— 2	73.2	21
März 1	54.33	20	33.2	27	21.52	9	75.3	20
11	54.13	31	35.9	24	21.43	15	77.3	19
21	53.82	40	38.3	22	21.28	21	79.2	18
31	53.42	47	40.5	17	21.07	24	81.0	16
April 10	52.95	52	42.2	14	20.83	26	82.6	12
20	52.43	55	43.6	8	20.57	28	83.8	8
30	51.88	55	44.4	3	20.29	27	84.6	5
Mai 10	51.33	53	44.7	— 2	20.02	26	85.1	1
20	50.80	49	44.5	7	19.76	24	85.2	— 2
30	50.31	43	43.8	11	19.52	20	85.0	7
Juni 9	49.88	37	42.7	16	19.32	17	84.3	10
19	49.51	30	41.1	20	19.15	13	83.3	13
29	49.21	21	39.1	23	19.02	8	82.0	16
Juli 9	49.00	13	36.8	26	18.94	4	80.4	18
19	48.87	3	34.2	28	18.90	— 1	78.6	21
29	48.84	— 7	31.4	30	18.91	6	76.5	23
Aug. 8	48.91	17	28.4	34	18.97	11	74.2	26
18	[12] 49.08	24	25.0	31	[12] 19.08	16	71.6	24
28	49.32	34	21.9	31	19.24	20	69.2	25
Sept. 7	49.66	42	18.8	30	19.44	25	66.7	25
17	50.08	50	15.8	29	19.69	29	64.2	24
27	50.58	58	12.9	26	19.98	33	61.8	24
Oct. 7	51.16	65	10.3	24	20.31	38	59.4	22
17	51.81	70	7.9	20	20.69	41	57.2	20
27	52.51	75	5.9	16	21.10	44	55.2	18
Nov. 6	53.26	77	4.3	12	21.54	46	53.4	14
16	54.03	79	3.1	7	22.00	47	52.0	11
26	54.82	78	2.4	2	22.47	46	50.9	7
Dec. 6	55.60	75	2.2	— 3	22.93	45	50.2	3
16	56.35	70	2.5	9	23.38	42	49.9	— 1
26	57.05	62	3.4	14	23.80	39	50.0	6
36	57.67		4.8		24.19		50.6	
Mittl. Ort	49.64		41.0		18.40		86.1	
	418)				140)			

1902	10 Leon. min. 4ᵐ.8. AR.		Decl. +		ε Leonis. 3ᵐ.0. AR.		Decl. +		υ Ursae maj. 3ᵐ.6. AR.		Decl. +		6 Sextantis. 6ᵐ.1. AR.		Decl. −	
	$9^h\ 28^m$		36° 49′		$9^h\ 40^m$		24° 13′		$9^h\ 44^m$		59° 29′		$9^h\ 46^m$		3° 47′	
Jan. 0	15.17	29	40.6	0	19.05	27	16.8	7	3.74	42	38.2	10	19.43	24	10.5	22
10	15.46	24	40.6	3	19.32	23	16.1	4	4.16	35	39.2	14	19.67	21	12.7	19
20	15.70	18	40.9	7	19.55	17	15.7	2	4.51	28	40.6	18	19.88	16	14.6	18
30	15.88	11	41.6	10	19.72	12	15.5	— 2	4.79	19	42.4	21	20.04	11	16.4	16
Febr. 9	15.99	6	42.6	12	19.84	7	15.7	4	4.98	9	44.5	23	20.15	6	18.0	13
19	16.05	0	43.8	13	19.91	1	16.1	6	5.07	0	46.8	24	20.21	1	19.3	11
März 1	16.05	6	45.1	14	19.92	— 3	16.7	8	5.07	8	49.2	24	20.22	— 2	20.4	9
11	15.99	10	46.5	14	19.89	8	17.5	8	4.99	17	51.6	23	20.20	7	21.3	6
21	15.89	14	47.9	13	19.81	11	18.3	9	4.82	23	53.9	21	20.13	9	21.9	3
31	15.75	17	49.2	12	19.70	14	19.2	9	4.59	28	56.0	19	20.04	12	22.2	2
April 10	15.58	19	50.4	11	19.56	15	20,1	9	4.31	31	57.9	14	19.92	14	22.4	0
20	15.39	19	51.5	8	19.41	16	21.0	8	4.00	33	59.3	11	19.78	14	22.4	3
30	15.20	19	52.3	6	19.25	16	21.8	6	3.67	34	60.4	6	19.64	14	22.1	3
Mai 10	15.01	19	52.9	3	19.09	15	22.4	5	3.33	33	61.0	2	19.50	13	21.8	5
20	14.82	16	53.2	1	18.94	13	22.9	4	3.00	31	61.2	— 2	19.37	12	21.3	6
30	14.66	14	53.3	— 2	18.81	12	23.3	2	2.69	28	61.0	7	19.25	11	20.7	8
Juni 9	14.52	11	53.1	4	18.69	9	23.5	1	2.41	24	60.3	11	19.14	9	19.9	8
19	14.41	8	52.7	6	18.60	8	23.6	— 1	2.17	19	59.2	14	19.05	7	19.1	9
29	14.33	4	52.1	9	18.52	4	23.5	3	1.98	14	57.8	18	18.98	5	18.2	10
Juli 9	14.29	2	51.2	11	18.48	2	23.2	3	1.84	9	56.0	21	18.93	2	17.2	10
19	14.27	— 2	50.1	13	18.46	— 1	22.9	6	1.75	3	53.9	24	18.91	0	16.2	9
29	14.29	6	48.8	14	18.47	4	22.3	7	1.72	— 2	51.5	25	18.91	2	15.3	9
Aug. 8	14.35	10	47.4	17	18.51	8	21.6	9	1.74	9	49.0	30	18.93	6	14.4	9
18	[12] 14.45	13	45.7	17	[16] 18.59	10	20.7	10	[17] 1.83	15	46.0	28	[17] 18.99	8	13.5	6
28	14.58	16	44.0	18	18.69	13	19.7	12	1.98	20	43.2	28	19.07	11	12.9	4
Sept. 7	14.74	20	42.2	18	18.82	17	18.5	13	2.18	26	40.4	29	19.18	15	12.5	2
17	14.94	23	40.4	19	18.99	19	17.2	15	2.44	31	37.5	28	19.33	17	12.3	— 1
27	15.17	27	38.5	20	19.18	23	15.7	15	2.75	37	34.7	26	19.50	21	12.4	4
Oct. 7	15.44	30	36.5	19	19.41	26	14.2	17	3.12	43	32.1	25	19.71	23	12.8	7
17	15.74	33	34.6	19	19.67	29	12.5	18	3.55	46	29.6	23	19.94	26	13.5	10
27	16.07	35	32.7	18	19.96	31	10.7	17	4.01	51	27.3	20	20.20	29	14.5	13
Nov. 6	16.42	37	30.9	16	20.27	33	9.0	17	4.52	53	25.3	15	20.49	30	15.8	16
16	16.79	38	29.3	14	20.60	34	7.3	17	5.05	55	23.8	12	20.79	32	17.4	18
26	17.17	38	27.9	11	20.94	34	5.6	16	5.60	55	22.6	8	21.11	31	19.2	20
Dec. 6	17.55	36	26.8	8	21.28	33	4.0	13	6.15	54	21.8	2	21.42	31	21.2	21
16	17.91	34	26.0	5	21.61	32	2.7	11	6.69	50	21.6	— 3	21.73	29	23.3	21
26	18.25	31	25.5	2	21.93	29	1.6	9	7.19	46	21.9	7	22.02	26	25.4	21
36	18.56		25.3		22.22		0.7		7.65		22.6		22.28		27.5	
Mittl. Ort	13.36		58.4		17.40		32.3		1.59		59.9		17.77		2.1	
	419)				142)				143)				572)			

1902	Gr. 1586. 6m.0. AR.		Decl. +		π Leonis. 5m.0. AR.		Decl. +		η Leonis. 3m.3. AR.		Decl. +		α Leonis. 1m.3. AR.		Decl. +	
	9h 49m		73° 20′		9h 55m		8° 30′		10h 1m		17° 13′		10h 3m		12° 26′	
Jan. 0	40.87	71	21.8	15	3.66	26	40.8	16	61.08	27	72.3	12	10.71	27	34.2	14
10	41.58	58	23.3	19	3.92	22	39.2	13	61.35	23	71.1	9	10.98	23	32.8	11
20	42.16	45	25.2	23	4.14	18	37.9	11	61.58	19	70.2	6	11.21	18	31.7	9
30	42.61	30	27.5	26	4.32	12	36.8	9	61.77	14	69.6	3	11.39	14	30.8	7
Febr. 9	42.91	14	30.1	29	4.44	8	35.9	6	61.91	9	69.3	1	11.53	8	30.1	4
19	43.05	— 2	33.0	28	4.52	3	35.3	3	62.00	3	69.2	— 2	11.61	4	29.7	1
März 1	43.03	16	35.8	29	4.55	— 2	35.0	2	62.03	— 1	69.4	4	11.65	— 1	29.6	— 1
11	42.87	31	38.7	26	4.53	6	34.8	— 1	62.02	5	69.8	5	11.64	5	29.7	3
21	42.56	42	41.3	24	4.47	9	34.9	2	61.97	9	70.3	7	11.59	8	30.0	5
31	42.14	52	43.7	20	4.38	11	35.1	4	61.88	11	71.0	7	11.51	11	30.5	5
April 10	41.62	59	45.7	16	4.27	13	35.5	4	61.77	13	71.7	8	11.40	13	31.0	6
20	41.03	64	47.3	11	4.14	14	35.9	5	61.64	14	72.5	7	11.27	13	31.6	6
30	40.39	65	48.4	6	4.00	14	36.4	6	61.50	15	73.2	7	11.14	14	32.2	6
Mai 10	39.74	65	49.0	1	3.86	13	37.0	5	61.35	14	73.9	6	11.00	14	32.8	6
20	39.09	61	49.1	— 5	3.73	12	37.5	6	61.21	13	74.5	5	10.86	13	33.4	6
30	38.48	58	48.6	10	3.61	11	38.1	6	61.08	11	75.0	5	10.73	11	34.0	5
Juni 9	37.90	50	47.6	14	3.50	9	38.7	5	60.97	10	75.5	3	10.62	9	34.5	5
19	37.40	42	46.2	19	3.41	8	39.2	6	60.87	8	75.8	3	10.53	8	35.0	4
29	36.98	33	44.3	22	3.33	5	39.8	4	60.79	6	76.1	1	10.45	6	35.4	3
Juli 9	36.65	24	42.1	26	3.28	3	40.2	4	60.73	3	76.2	— 1	10.39	4	35.7	2
19	36.41	14	39.5	29	3.25	0	40.6	3	60.70	1	76.1	1	10.35	1	35.9	1
29	36.27	2	36.6	31	3.25	2	40.9	2	60.69	— 1	76.0	3	10.34	— 2	36.0	— 1
Aug. 8	36.25	— 8	33.5	32	3.27	5	41.1	0	60.70	5	75.7	5	10.36	4	35.9	2
18	36.33	21	30.3	36	3.32	8	41.1	1	60.75	8	75.2	7	10.40	8	35.7	3
28	[18] 36.54	31	26.7	33	[20] 3.40	11	41.0	3	[21] 60.83	10	74.5	8	[22] 10.48	10	35.4	6
Sept. 7	36.85	41	23.4	32	3.51	14	40.7	5	60.93	14	73.7	10	10.58	13	34.8	7
17	37.26	51	20.2	31	3.65	17	40.2	7	61.07	17	72.7	12	10.71	16	34.1	9
27	37.77	59	17.1	29	3.82	20	39.5	9	61.24	20	71.5	13	10.87	20	33.2	12
Oct. 7	38.36	69	14.2	27	4.02	23	38.6	12	61.44	23	70.2	16	11.07	22	32.0	13
17	39.05	77	11.5	23	4.25	26	37.4	14	61.67	27	68.6	16	11.29	26	30.7	16
27	39.82	83	9.2	20	4.51	29	36.0	16	61.94	29	67.0	18	11.55	29	29.1	16
Nov. 6	40.65	88	7.2	15	4.80	30	34.4	17	62.23	31	65.2	19	11.84	30	27.5	18
16	41.53	90	5.7	10	5.10	32	32.7	18	62.54	33	63.3	18	12.14	32	25.7	19
26	42.43	91	4.7	4	5.42	32	30.9	19	62.87	33	61.5	18	12.46	33	23.8	18
Dec. 6	43.34	89	4.3	— 1	5.74	32	29.0	18	63.20	33	59.7	17	12.79	32	22.0	18
16	44.23	83	4.4	7	6.06	30	27.2	18	63.53	31	58.0	15	13.11	31	20.2	17
26	45.06	76	5.1	12	6.36	27	25.4	17	63.84	28	56.5	13	13.42	28	18.5	15
36	45.82		6.3		6.63		23.7		64.12		55.2		13.70		17.0	
Mittl. Ort	37.86		44.8		2.10		52.4		59.56		86.2		9.20		46.8	
	421)				423)				145)				146)			

1902	λ Hydrae. 4ᵐ.0 AR.	Δ	Decl. —	Δ	λ Ursae maj. 3ᵐ.3 AR.	Δ	Decl. +	Δ	ζ Leonis. 3ᵐ.0 AR.	Δ	Decl. +	Δ	μ Ursae maj. 3ᵐ.0 AR.	Δ	Decl. +	Δ
	$10^h\ 5^m$		11° 52′		$10^h\ 11^m$		43° 23′		$10^h\ 11^m$		23° 53′		$10^h\ 16^m$		41° 58′	
Jan. 0	50.24	26	16.1	24	12.88	35	53.2	0	15.91	29	65.9	9	31.10	35	73.1	1
10	50.50	22	18.5	24	13.23	30	53.2	4	16.20	25	65.0	6	31.45	29	73.0	3
20	50.72	17	20.9	22	13.53	24	53.6	8	16.45	21	64.4	3	31.74	24	73.3	7
30	50.89	13	23.1	21	13.77	18	54.4	12	16.66	15	64.1	1	31.98	19	74.0	11
Febr. 9	51.02	8	25.2	18	13.95	12	55.6	15	16.81	10	64.2	3	32.17	12	75.1	13
19	51.10	3	27.0	16	14.07	5	57.1	17	16.91	5	64.5	6	32.29	6	76.4	16
März 1	51.13	1	28.6	13	14.12	1	58.8	18	16.96	1	65.1	8	32.35	1	78.0	18
11	51.12	5	29.9	11	14.11	7	60.6	18	16.95	4	65.9	9	32.34	6	79.8	18
21	51.07	9	31.0	8	14.04	12	62.4	18	16.91	9	66.8	10	32.28	11	81.6	18
31	50.98	11	31.8	6	13.92	15	64.2	17	16.82	11	67.8	10	32.17	14	83.4	17
April 10	50.87	12	32.4	3	13.77	18	65.9	15	16.71	13	68.8	10	32.03	17	85.1	15
20	50.75	14	32.7	0	13.59	20	67.4	13	16.58	15	69.8	9	31.86	20	86.6	13
30	50.61	13	32.7	1	13.39	21	68.7	10	16.43	15	70.7	8	31.66	20	87.9	10
Mai 10	50.48	14	32.6	4	13.18	21	69.7	6	16.28	15	71.5	7	31.46	20	88.9	7
20	50.34	13	32.2	6	12.97	20	70.3	3	16.13	14	72.2	6	31.26	19	89.6	4
30	50.21	12	31.6	8	12.77	18	70.6	0	15.99	12	72.8	3	31.07	17	90.0	0
Juni 9	50.09	10	30.8	9	12.59	16	70.6	3	15.87	11	73.1	2	30.90	16	90.0	2
19	49.99	9	29.9	11	12.43	13	70.3	7	15.76	9	73.3	0	30.74	13	89.8	6
29	49.90	7	28.8	11	12.30	10	69.6	9	15.67	7	73.3	1	30.61	10	89.2	8
Juli 9	49.83	4	27.7	13	12.20	7	68.7	13	15.60	4	73.2	3	30.51	8	88.4	12
19	49.79	2	26.4	12	12.13	4	67.4	15	15.56	2	72.9	5	30.43	4	87.2	14
29	49.77	0	25.2	13	12.09	1	65.9	18	15.54	0	72.4	7	30.39	1	85.8	17
Aug. 8	49.77	2	23.9	12	12.08	4	64.1	19	15.54	4	71.7	9	30.38	3	84.1	18
18	49.79	7	22.7	11	12.12	8	62.2	23	15.58	7	70.8	11	30.41	7	82.3	23
28	[23] 49.86	9	21.6	9	[24] 12.20	12	59.9	23	[24] 15.65	10	69.7	12	[25] 30.48	11	80.0	22
Sept. 7	49.95	12	20.7	7	12.32	15	57.6	23	15.75	13	68.5	14	30.59	15	77.8	23
17	50.07	16	20.0	3	12.47	20	55.3	24	15.88	17	67.1	16	30.74	19	75.5	24
27	50.23	19	19.7	0	12.67	24	52.9	25	16.05	20	65.5	17	30.93	23	73.1	25
Oct. 7	50.42	23	19.7	3	12.91	28	50.4	24	16.25	23	63.8	18	31.16	27	70.6	24
17	50.65	25	20.0	7	13.19	32	48.0	24	16.48	27	62.0	19	31.43	31	68.2	23
27	50.90	28	20.7	11	13.51	36	45.6	22	16.75	29	60.1	19	31.74	34	65.9	23
Nov. 6	51.18	31	21.8	14	13.87	38	43.4	20	17.04	32	58.2	19	32.08	37	63.6	20
16	51.49	32	23.2	18	14.25	40	41.4	18	17.36	34	56.3	19	32.45	40	61.6	18
26	51.81	32	25.0	20	14.65	41	39.6	14	17.70	34	54.4	18	32.85	40	59.8	15
Dec. 6	52.13	31	27.0	23	15.06	41	38.2	10	18.04	34	52.6	16	33.25	40	58.3	12
16	52.44	30	29.3	23	15.47	39	37.2	7	18.38	33	51.0	13	33.65	39	57.1	7
26	52.74	27	31.6	24	15.86	37	36.5	2	18.71	31	49.7	10	34.04	36	56.4	4
36	53.01		34.0		16.23		36.3		19.02		48.7		34.40		56.0	
Mittl. Ort	48.61		10.4		11,35		73.2		14.45		81.5		29.61		92.8	
	573)				147)				148)				149)			

1902	30 H. Urs. maj. $5^m.0$. AR.		Decl. +		μ Hydrae. $4^m.0$. AR.		Decl. —		31 Leon. min. $4^m.3$ AR.		Decl. +		Lac. α Antliae. $4^m.2$. AR.		Decl. —	
	$10^h\ 17^m$		66° 3′		$10^h\ 21^m$		16° 20′		$10^h\ 22^m$		37° 11′		$10^h\ 22^m$		30° 34′	
Jan. 0	6.07	56	20.6	9	22.61	28	13.5	25	14.54	33	76.0	4	41.73	28	9.0	29
10	6.63	49	21.5	14	22.89	23	16.0	25	14.87	28	75.6	0	42.01	25	11.9	30
20	7.12	39	22.9	18	23.12	19	18.5	25	15.15	24	75.6	5	42.26	19	14.9	30
30	7.51	29	24.7	23	23.31	14	21.0	23	15.39	19	76.1	7	42.45	15	17.9	29
Febr. 9	7.80	18	27.0	25	23.45	10	23.3	21	15.58	12	76.8	11	42.60	10	20.8	28
19	7.98	7	29.5	27	23.55	5	25.4	19	15.70	6	77.9	14	42.70	4	23.6	26
März 1	8.05	— 4	32.2	27	23.60	0	27.3	16	15.76	1	79.3	15	42.74	— 1	26.2	24
11	8.01	15	34.9	26	23.60	4	28.9	13	15.77	— 5	80.8	16	42.73	5	28.6	21
21	7.86	24	37.5	25	23.56	7	30.2	11	15.72	9	82.4	16	42.68	8	30.7	18
31	7.62	31	40.0	23	23.49	10	31.3	8	15.63	13	84.0	16	42.60	11	32.5	14
April 10	7.31	36	42.3	18	23.39	12	32.1	5	15.50	15	85.6	14	42.49	14	33.9	11
20	6.95	40	44.1	15	23.27	13	32.6	3	15.35	17	87.0	13	42.35	15	35.0	8
30	6.55	43	45.6	10	23.14	14	32.9	— 1	15.18	18	88.3	10	42.20	16	35.8	3
Mai 10	6.12	43	46.6	5	23.00	14	32.8	2	15.00	18	89.3	8	42.04	17	36.1	1
20	5.69	43	47.1	0	22.86	13	32.6	5	14.82	18	90.1	5	41.87	16	36.2	— 3
30	5.26	40	47.1	5	22.73	12	32.1	7	14.64	16	90.6	2	41.71	15	35.9	7
Juni 9	4.86	36	46.6	9	22.61	11	31.4	9	14.48	14	90.8	— 1	41.56	14	35.2	9
19	4.50	32	45.7	14	22.50	10	30.5	11	14.34	12	90.7	4	41.42	13	34.3	13
29	4.18	26	44.3	18	22.40	8	29.4	13	14.22	10	90.3	7	41.29	11	33.0	16
Juli 9	3.92	20	42.5	21	22.32	6	28.1	13	14.12	7	89.6	9	41.18	8	31.4	17
19	3.72	13	40.4	25	22.26	4	26.8	14	14.05	4	88.7	12	41.10	6	29.7	19
29	3.59	6	37.9	28	22.22	2	25.4	14	14.01	1	87.5	14	41.04	3	27.8	20
Aug. 8	3.53	0	35.1	29	22.20	— 1	24.0	14	14.00	— 2	86.1	15	41.01	1	25.8	20
18	3.53	9	32.2	34	22.21	5	22.6	14	14.02	6	84.6	20	41.00	— 4	23.8	22
28	[26] 3.62	16	28.8	32	[27] 22.26	7	21.2	11	[27] 14.08	10	82.6	20	[27] 41.04	7	21.6	18
Sept. 7	3.78	23	25.6	32	22.33	11	20.1	9	14.18	13	80.6	21	41.11	12	19.8	16
17	4.01	31	22.4	32	22.44	15	19.2	6	14.31	17	78.5	23	41.23	15	18.2	14
27	4.32	38	19.2	31	22.59	18	18.6	3	14.48	21	76.2	23	41.38	19	16.8	9
Oct. 7	4.70	45	16.1	29	22.77	22	18.3	— 1	14.69	25	73.9	23	41.57	24	15.9	6
17	5.15	51	13.2	26	22.99	25	18.4	5	14.94	29	71.6	23	41.81	27	15.3	0
27	5.66	57	10.6	23	23.24	28	18.9	9	15.23	32	69.3	22	42.08	30	15.3	4
Nov. 6	6.23	62	8.3	20	23.52	30	19.8	13	15.55	35	67.1	21	42.38	33	15.7	9
16	6.85	65	6.3	15	23.82	32	21.1	17	15.90	37	65.0	19	42.71	35	16.6	14
26	7.50	66	4.8	10	24.14	33	22.8	19	16.27	38	63.1	16	43.06	35	18.0	19
Dec. 6	8.16	66	3.8	5	24.47	32	24.7	22	16.65	38	61.5	14	43.41	35	19.9	22
16	8.82	64	3.3	— 1	24.79	31	26.9	24	17.03	37	60.1	10	43.76	33	22.1	25
26	9.46	59	3.4	6	25.10	29	29.3	25	17.40	35	59.1	5	44.09	30	24.6	28
36	10.05		4.0		25.39		31.8		17.75		58.6		44.39		27.4	
Mittl. Ort	4.15		44.0		21.01		9.5		13.12		94.8		39.94		9.0	
	424)				574)				426)				575)			

1902	36 Ursae maj. 5m.0 AR.		Decl. +		9 H. Draconis. 4m.6 AR.		Decl. +		33 Sextantis. 6m.4 AR.		Decl. −		42 Leon. min. 5m.0 AR.		Decl. +	
	10h 24m		56° 28′		10h 26m		76° 12′		10h 36m		1° 13′		10h 40m		31° 11′	
Jan. 0	23.08 s	44	37.2″	4	48.85 s	91	40.3″	11	26.34 s	28	42.5″	21	26.27 s	33	38.0″	8
10	23.52	39	37.6	9	49.76	79	41.4	17	26.62	24	44.6	19	26.60	29	37.2	4
20	23.91	32	38.5	14	50.55	65	43.1	21	26.86	21	46.5	17	26.89	24	36.8	0
30	24.23	24	39.9	18	51.20	48	45.2	26	27.07	16	48.2	15	27.13	19	36.8	4
Febr. 9	24.47	16	41.7	20	51.68	30	47.8	28	27.23	11	49.7	12	27.32	14	37.2	7
19	24.63	7	43.7	23	51.98	11	50.6	29	27.34	7	50.9	11	27.46	8	37.9	10
März 1	24.70	0	46.0	24	52.09	— 7	53.5	30	27.41	2	52.0	7	27.54	3	38.9	12
11	24.70	9	48.4	24	52.02	24	56.5	29	27.43	— 2	52.7	5	27.57	— 2	40.1	14
21	24.61	15	50.8	23	51.78	40	59.4	27	27.41	5	53.2	3	27.55	7	41.5	14
31	24.46	20	53.1	22	51.38	54	62.1	24	27.36	8	53.5	0	27.48	10	42.9	14
April 10	24.26	25	55.3	18	50.84	64	64.5	20	27.28	10	53.5	1	27.38	12	44.3	14
20	24.01	28	57.1	15	50.20	73	66.5	16	27.18	11	53.4	2	27.26	15	45.7	12
30	23.73	29	58.6	11	49.47	77	68.1	10	27.07	12	53.2	4	27.11	15	46.9	11
Mai 10	23.44	30	59.7	7	48.70	79	69.1	5	26.95	13	52.8	5	26.96	16	48.0	9
20	23.14	29	60.4	3	47.91	79	69.6	0	26.82	12	52.3	6	26.80	16	48.9	7
30	22.85	27	60.7	— 1	47.12	75	69.6	6	26.70	12	51.7	6	26.64	14	49.6	4
Juni 9	22.58	24	60.6	6	46.37	70	69.0	11	26.58	10	51.1	8	26.50	14	50.0	2
19	22.34	22	60.0	10	45.67	63	67.9	16	26.48	9	50.3	7	26.36	11	50.2	— 1
29	22.12	18	59.0	14	45.04	53	66.3	21	26.39	8	49.6	8	26.25	10	50.1	3
Juli 9	21.94	14	57.6	18	44.51	43	64.2	24	26.31	6	48.8	8	26.15	8	49.8	6
19	21.80	9	55.8	21	44.08	32	61.8	28	26.25	4	48.0	7	26.07	5	49.2	8
29	21.71	4	53.7	23	43.76	21	59.0	30	26.21	2	47.3	7	26.02	2	48.4	10
Aug. 8	21.67	0	51.4	25	43.55	7	56.0	33	26.19	— 1	46.6	5	26.00	0	47.4	13
18	21.67	6	48.9	27	43.48	— 5	52.7	34	26.20	3	46.1	4	26.00	3	46.1	15
28	21.73	12	46.2	32	43.53	21	49.3	38	26.23	7	45.7	3	26.03	8	44.6	18
Sept. 7	21.85	17	43.0	29	43.74	32	45.5	35	26.30	9	45.4	0	26.11	10	42.8	18
17	22.02	23	40.1	30	44.06	45	42.0	34	26.39	13	45.4	2	26.21	14	41.0	20
27	22.25	28	37.1	29	44.51	57	38.6	33	26.52	17	45.6	5	26.35	18	39.0	22
Oct. 7	22.53	33	34.2	29	45.08	70	35.3	31	26.69	20	46.1	8	26.53	22	36.8	22
17	22.86	38	31.3	26	45.78	81	32.2	27	26.89	23	46.9	11	26.75	25	34.6	22
27	23.24	43	28.7	24	46.59	89	29.5	24	27.12	26	48.0	13	27.00	30	32.4	23
Nov. 6	23.67	47	26.3	21	47.48	98	27.1	20	27.38	29	49.3	16	27.30	32	30.1	22
16	24.14	49	24.2	18	48.46	102	25.1	15	27.67	31	50.9	19	27.62	34	27.9	21
26	24.63	51	22.4	13	49.48	106	23.6	9	27.98	32	52.8	20	27.96	36	25.8	18
Dec. 6	25.14	51	21.1	8	50.54	106	22.7	3	28.30	32	54.8	21	28.32	37	24.0	16
16	25.65	50	20.3	4	51.60	102	22.4	— 3	28.62	31	56.9	21	28.69	35	22.4	13
26	26.15	47	19.9	— 1	52.62	95	22.7	8	28.93	29	59.0	20	29.04	33	21.1	10
36	26.62		20.0		53.57		23.5		29.22		61.0		29.37		20.1	
Mittl. Ort	21.52		59.5		46.46		64.6		24.93		34.4		25.01		55.5	
	427)				150)				576)				431)			

1902	*l* Leonis. $5^m.1$. AR.		Decl. +		β Ursae maj. $2^m.3$. AR.		Decl. +		α Ursae maj. $2^m.0$. AR.		Decl. +		χ Leonis. $4^m.8$. AR.		Decl. +	
	$10^h\ 44^m$		$11^\circ\ 3'$		$10^h\ 55^m$		$56^\circ\ 53'$		$10^h\ 57^m$		$62^\circ\ 16'$		$10^h\ 59^m$		$7^\circ\ 51'$	
Jan. 0	$7^s.70$	29	$37''.9$	16	$57^s.05$	47	$65''.5$	1	$42^s.27$	54	$24''.9$	3	$58^s.92$	29	$47''.2$	18
10	7.99	26	36.3	13	57.52	43	65.6	7	42.81	49	25.2	8	59.21	27	45.4	16
20	8.25	22	35.0	11	57.95	36	66.3	12	43.30	41	26.0	14	59.48	23	43.8	13
30	8.47	17	33.9	9	58.31	29	67.5	16	43.71	33	27.4	18	59.71	18	42.5	10
Febr. 9	8.64	13	33.0	5	58.60	22	69.1	19	44.04	25	29.2	22	59.89	14	41.5	8
19	8.77	8	32.5	2	58.82	13	71.0	23	44.29	14	31.4	24	60.03	9	40.7	4
März 1	8.85	3	32.3	0	58.95	4	73.3	25	44.43	5	33.8	27	60.12	5	40.3	2
11	8.88	1	32.3	2	58.99	3	75.8	25	44.48	4	36.5	27	60.17	0	40.1	0
21	8.87	4	32.5	4	58.96	10	78.3	25	44.44	12	39.2	26	60.17	3	40.1	3
31	8.83	8	32.9	6	58.86	16	80.8	23	44.32	20	41.8	25	60.14	6	40.4	4
April 10	8.75	10	33.5	6	58.70	21	83.1	21	44.12	26	44.3	22	60.08	9	40.8	5
20	8.65	11	34.1	7	58.49	25	85.2	19	43.86	31	46.5	19	59.99	10	41.3	6
30	8.54	12	34.8	7	58.24	28	87.1	15	43.55	34	48.4	15	59.89	11	41.9	7
Mai 10	8.42	13	35.5	7	57.96	29	88.6	10	43.21	35	49.9	10	59.78	12	42.6	7
20	8.29	12	36.2	7	57.67	30	89.6	6	42.86	36	50.9	6	59.66	12	43.3	7
30	8.17	12	36.9	6	57.37	28	90.2	2	42.50	35	51.5	1	59.54	12	44.0	6
Juni 9	8.05	11	37.5	6	57.09	27	90.4	3	42.15	34	51.6	4	59.42	11	44.6	7
19	7.94	10	38.1	5	56.82	25	90.1	7	41.81	31	51.2	9	59.31	10	45.3	5
29	7.84	8	38.6	4	56.57	22	89.4	12	41.50	27	50.3	13	59.21	8	45.8	5
Juli 9	7.76	6	39.0	2	56.35	18	88.2	15	41.23	23	49.0	17	59.13	7	46.3	4
19	7.70	4	39.2	2	56.17	14	86.7	19	41.00	18	47.3	21	59.06	6	46.7	3
29	7.66	2	39.4	0	56.03	10	84.8	22	40.82	14	45.2	24	59.00	4	47.0	2
Aug. 8	7.64	0	39.4	1	55.93	5	82.6	25	40.68	7	42.8	27	58.96	1	47.2	1
18	7.64	2	39.3	3	55.88	0	80.1	27	40.61	2	40.1	29	58.95	1	47.3	1
28	7.66	7	39.0	5	55.88	5	77.4	32	40.59	5	37.2	34	58.96	4	47.2	4
Sept. 7	7.73	9	38.5	7	55.93	11	74.2	30	40.64	11	33.8	33	59.00	8	46.8	5
17	7.82	12	37.8	10	56.04	16	71.2	31	40.75	19	30.5	33	59.08	10	46.3	8
27	7.94	16	36.8	11	56.20	23	68.1	32	40.94	25	27.2	32	59.18	14	45.5	10
Oct. 7	8.10	20	35.7	14	56.43	29	64.9	31	41.19	32	24.0	32	59.32	18	44.5	12
17	8.30	23	34.3	16	56.72	34	61.8	29	41.51	39	20.8	30	59.50	22	43.3	15
27	8.53	26	32.7	17	57.06	40	58.9	27	41.90	45	17.8	28	59.72	25	41.8	17
Nov. 6	8.79	29	31.0	19	57.46	44	56.2	25	42.35	50	15.0	25	59.97	28	40.1	18
16	9.08	31	29.1	20	57.90	48	53.7	21	42.85	54	12.5	21	60.25	30	38.3	20
26	9.39	32	27.1	20	58.38	51	51.6	17	43.39	58	10.4	16	60.55	32	36.3	20
Dec. 6	9.71	33	25.1	20	58.89	51	49.9	12	43.97	58	8.8	12	60.87	33	34.3	20
16	10.04	32	23.1	18	59.40	51	48.7	8	44.55	58	7.6	6	61.20	32	32.3	20
26	10.36	30	21.3	18	59.91	48	47.9	1	45.13	56	7.0	0	61.52	30	30.3	18
36	10.66		19.5		60.39		47.8		45.69		7.0		61.82		28.5	
Mittl. Ort	6.41		49.7		55.89		88.4		41.10		48.5		57.69		57.6	
	432)				153)				154)				434)			

1902	ψ Ursae maj. $3^m.1$. AR.		Decl. +		β Crateris. $4^m.0$. AR.		Decl. −		δ Leonis. $2^m.3$. AR.		Decl. +		ϑ Leonis. $3^m.3$. AR.		Decl. +	
	11h 4m		45° 1′		11h 6m		22° 17′		11h 8m		21° 3′		11h 9m		15° 57′	
Jan. 0	10.46	39	27.9	4	51.62	31	27.6	26	54.97	32	24.5	14	6.99	31	42.7	16
10	10.85	35	27.5	0	51.93	28	30.2	26	55.29	28	23.1	10	7.30	28	41.1	13
20	11.20	31	27.5	6	52.21	23	32.8	26	55.57	25	22.1	7	7.58	24	39.8	9
30	11.51	25	28.1	10	52.44	19	35.4	26	55.82	21	21.4	3	7.82	20	38.9	6
Febr. 9	11.76	18	29.1	14	52.63	14	38.0	24	56.03	16	21.1	0	8.02	16	38.3	3
19	11.94	12	30.5	17	52.77	10	40.4	22	56.19	10	21.1	4	8.18	10	38.0	— 1
März 1	12.06	6	32.2	19	52.87	5	42.6	20	56.29	6	21.5	6	8.28	6	38.1	3
11	12.12	0	34.1	20	52.92	1	44.6	17	56.35	2	22.1	8	8.34	1	38.4	5
21	12.12	6	36.1	21	52.93	— 3	46.3	15	56.37	— 3	22.9	10	8.35	— 2	38.9	7
31	12.06	10	38.2	21	52.90	6	47.8	12	56.34	6	23.9	11	8.33	6	39.6	8
April 10	11.96	14	40.3	19	52.84	9	49.0	10	56.28	9	25.0	11	8.27	8	40.4	9
20	11.82	18	42.2	17	52.75	10	50.0	6	56.19	10	26.1	11	8.19	10	41.3	10
30	11.64	19	43.9	15	52.65	12	50.6	4	56.09	12	27.2	11	8.09	12	42.3	9
Mai 10	11.45	20	45.4	12	52.53	13	51.0	1	55.97	13	28.3	9	7.97	12	43.2	9
20	11.25	21	46.6	8	52.40	13	51.1	— 2	55.84	13	29.2	8	7.85	12	44.1	7
30	11.04	20	47.4	4	52.27	13	50.9	5	55.71	13	30.0	7	7.73	12	44.8	7
Juni 9	10.84	19	47.8	1	52.14	12	50.4	7	55.58	12	30.7	6	7.61	12	45.5	6
19	10.65	17	47.9	— 3	52.02	12	49.7	10	55.46	12	31.3	3	7.49	11	46.1	4
29	10.48	15	47.6	7	51.90	11	48.7	11	55.34	10	31.6	1	7.38	9	46.5	3
Juli 9	10.33	14	46.9	10	51.79	10	47.6	13	55.24	8	31.7	— 1	7.29	8	46.8	2
19	10.19	10	45.9	13	51.69	8	46.3	14	55.16	7	31.6	3	7.21	7	47.0	— 1
29	10.09	7	44.6	17	51.61	6	44.9	15	55.09	4	31.3	5	7.14	4	46.9	2
Aug. 8	10.02	4	42.9	19	51.55	3	43.4	15	55.05	3	30.8	6	7.10	2	46.7	4
18	9.98	0	41.0	22	51.52	1	41.9	15	55.02	0	30.2	9	7.08	0	46.3	6
28	9.98	3	38.8	24	51.51	— 3	40.4	14	55.02	4	29.3	11	7.08	2	45.7	8
Sept. 7	10.01	9	36.4	28	51.54	7	39.0	14	55.06	7	28.2	14	7.10	7	44.9	11
17	7 10.10	13	33.6	27	8 51.61	10	37.6	10	9 55.13	10	26.8	15	9 7.17	10	43.8	13
27	10.23	17	30.9	28	51.71	14	36.6	6	55.23	14	25.3	18	7.27	14	42.5	14
Oct. 7	10.40	23	28.1	28	51.85	19	36.0	4	55.37	18	23.5	19	7.41	18	41.1	17
17	10.63	27	25.3	28	52.04	22	35.6	— 1	55.55	22	21.6	20	7.59	21	39.4	18
27	10.90	31	22.5	27	52.26	26	35.7	5	55.77	25	19.6	22	7.80	25	37.6	20
Nov. 6	11.21	35	19.8	25	52.52	30	36.2	9	56.02	29	17.4	21	8.05	28	35.6	21
16	11.56	39	17.3	22	52.82	32	37.1	13	56.31	31	15.3	22	8.33	31	33.5	21
26	11.95	40	15.1	20	53.14	34	38.4	17	56.62	33	13.1	21	8.64	32	31.4	21
Dec. 6	12.35	42	13.1	16	53.48	34	40.1	20	56.95	34	11.0	20	8.96	34	29.3	20
16	12.77	42	11.5	11	53.82	33	42.1	23	57.29	34	9.0	18	9.30	33	27.3	18
26	13.19	40	10.4	7	54.15	31	44.4	24	57.63	33	7.2	14	9.63	32	25.5	17
36	13.59		9.7		54.46		46.8		57.96		5.8		9.95		23.8	
Mittl. Ort	9.40		48.6		50.17		27.2		53.87		38.9		5.87		55.4	
	155)				578)				156)				157)			

1902	ν Ursae maj. 3ᵐ.3. AR.	Diff.	Decl. +	Diff.	δ Crateris. 3ᵐ.3. AR.	Diff.	Decl. −	Diff.
	11ʰ 13ᵐ		33° 37′		11ʰ 14ᵐ		14° 14′	
Jan. 0	12.42		27.3		27.69		56.7	
10	12.77	35	26.4	9	27.99	30	59.1	24
20	13.08	31	25.9	5	28.26	27	61.4	23
30	13.36	28	25.8	1 —	28.50	24	63.7	23
Febr. 9	13.59	23	26.2	4	28.69	19	65.9	22
19	13.76	17	26.9	7	28.84	15	67.9	20
März 1	13.88	12	28.0	11	28.95	11	69.7	18
11	13.95	7	29.3	13	29.01	6	71.2	15
21	13.96	1 —	30.8	15	29.03	2 —	72.4	12
31	13.93	3	32.5	17	29.01	2	73.5	11
April 10	13.86	7	34.2	17	28.96	5	74.3	8
20	13.76	10	35.8	16	28.89	7	74.8	5
30	13.63	13	37.3	15	28.80	9	75.1	3
Mai 10	13.49	14	38.6	13	28.69	11	75.2	1 —
20	13.33	16	39.8	12	28.57	12	75.0	2
30	13.17	16	40.7	9	28.45	12	74.7	3
Juni 9	13.02	15	41.4	7	28.33	12	74.2	5
19	12.87	15	41.7	3	28.22	11	73.5	7
29	12.73	14	41.8	1 —	28.11	11	72.6	9
Juli 9	12.61	12	41.6	2	28.01	10	71.7	9
19	12.50	11	41.0	6	27.92	9	70.6	11
29	12.42	8	40.2	8	27.84	8	69.4	12
Aug. 8	12.36	6	39.1	11	27.78	6	68.3	11
18	12.32	4	37.8	13	27.75	3	67.1	12
28	12.31	1 —	36.3	15	27.74	1 —	66.0	11
Sept. 7	12.34	3	34.5	18	27.76	2	65.0	10
17	[10] 12.41	7	32.2	23	[10] 27.82	6	64.1	9
27	12.51	10	30.0	22	27.92	10	63.6	5
Oct. 7	12.65	14	27.7	23	28.05	13	63.4	2
17	12.84	19	25.2	25	28.22	17	63.4	0
27	13.08	24	22.7	25	28.43	21	63.8	4
Nov. 6	13.35	27	20.2	25	28.68	25	64.6	8
16	13.65	30	17.8	24	28.96	28	65.8	12
26	13.99	34	15.5	23	29.26	30	67.3	15
Dec. 6	14.35	36	13.4	21	29.58	32	69.0	17
16	14.72	37	11.5	19	29.91	33	71.0	20
26	15.08	36	10.0	15	30.24	33	73.2	22
36	15.44	36	8.9	11	30.55	31	75.6	24
Mittl. Ort	11.40		45.2		26.37		53.9	
	159)				579)			

1902	σ Leonis. 4ᵐ.1. AR.	Diff.	Decl. +	Diff.	Gr. 1771. 6ᵐ.1. AR.	Diff.	Decl. +	Diff.
	11ʰ 16ᵐ		6° 33′		11ʰ 17ᵐ		64° 51′	
Jan. 0	6.15		49.6		2.64		36.4	
10	6.45	30	47.8	18	3.24	60	36.5	1
20	6.73	28	46.1	17	3.78	54	37.3	8
30	6.97	24	44.7	14	4.25	47	38.6	13
Febr. 9	7.17	20	43.6	11	4.65	40	40.3	17
19	7.32	15	42.7	9	4.95	30	42.5	22
März 1	7.43	11	42.2	5	5.14	19	45.0	25
11	7.49	6	41.9	3	5.23	9	47.7	27
21	7.52	3 —	41.9	0	5.23	0	50.6	29
31	7.51	1	42.0	1	5.13	10	53.4	28
April 10	7.46	5	42.4	4	4.94	19	56.0	26
20	7.39	7	42.9	5	4.68	26	58.4	24
30	7.30	9	43.5	6	4.37	31	60.5	21
Mai 10	7.19	11	44.1	6	4.01	36	62.2	17
20	7.08	11	44.8	7	3.62	39	63.5	13
30	6.96	12	45.5	7	3.22	40	64.2	7
Juni 9	6.85	11	46.2	7	2.82	40	64.5	3 —
19	6.74	11	46.9	7	2.44	38	64.3	2
29	6.64	10	47.5	6	2.07	37	63.6	7
Juli 9	6.54	10	48.1	6	1.74	33	62.4	12
19	6.46	8	48.5	4	1.45	29	60.8	16
29	6.39	7	48.9	4	1.20	25	58.8	20
Aug. 8	6.34	5	49.2	3	1.01	19	56.4	24
18	6.32	2	49.3	1 —	0.88	13	53.7	27
28	6.31	1 —	49.2	1	0.80	8	50.7	30
Sept. 7	6.33	2	49.0	2	0.80	0	47.5	32
17	[11] 6.39	6	48.5	5	[11] 0.88	8	43.8	37
27	6.49	10	47.8	7	1.02	14	40.4	34
Oct. 7	6.62	13	46.8	10	1.25	23	37.0	34
17	6.78	16	45.6	12	1.55	30	33.6	34
27	6.98	20	44.2	14	1.93	38	30.4	32
Nov. 6	7.23	25	42.6	16	2.38	45	27.5	29
16	7.50	27	40.8	18	2.89	51	24.8	27
26	7.79	29	38.8	20	3.45	56	22.5	23
Dec. 6	8.11	32	36.7	21	4.06	61	20.7	18
16	8.43	32	34.6	21	4.68	62	19.4	13
26	8.76	33	32.6	20	5.31	63	18.6	8
36	9.07	31	30.7	19	5.92	61	18.4	2
Mittl. Ort	5.01		59.2		1.77		60.4	
	160)				436)			

1902	λ Draconis. 3ᵐ.3.				ξ Hydrae. 4ᵐ.0.				υ Leonis. 4ᵐ.8.				3 Draconis. 5ᵐ.3.			
	AR.		Decl. +		AR.		Decl. —		AR.		Decl. —		AR.		Decl. +	
	11ʰ 25ᵐ		69° 51′		11ʰ 28ᵐ		31° 18′		11ʰ 31ᵐ		0° 16′		11ʰ 36ᵐ		67° 16′	
Jan. 0	36.30	72	54.6	1	12.29	34	52.3	25	56.92	30	64.5	20	61.32	66	50.2	0
10	37.02	66	54.7	8	12.63	30	54.8	28	57.22	29	66.5	19	61.98	61	50.2	5
20	37.68	58	55.5	14	12.93	27	57.6	28	57.51	25	68.4	18	62.59	54	50.7	12
30	38.26	49	56.9	19	13.20	22	60.4	28	57.76	21	70.2	15	63.13	47	51.9	17
Febr. 9	38.75	38	58.8	23	13.42	17	63.2	27	57.97	16	71.7	12	63.60	36	53.6	22
19	39.13	25	61.1	26	13.59	12	65.9	27	58.13	12	72.9	10	63.96	26	55.8	25
März 1	39.38	13	63.7	29	13.71	8	68.6	25	58.25	8	73.9	7	64.22	14	58.3	27
11	39.51	0	66.6	29	13.79	3	71.1	22	58.33	4	74.6	5	64.36	4	61.0	29
21	39.51	11	69.5	29	13.82	—1	73.3	20	58.37	0	75.1	2	64.40	—7	63.9	29
31	39.40	23	72.4	28	13.81	5	75.3	17	58.37	3	75.3	0	64.33	17	66.8	28
April 10	39.17	31	75.2	25	13.76	7	77.0	15	58.34	5	75.3	2	64.16	25	69.6	26
20	38.86	40	77.7	22	13.69	10	78.5	11	58.29	8	75.1	3	63.91	33	72.2	23
30	38.46	45	79.9	19	13.59	12	79.6	8	58.21	9	74.8	4	63.58	37	74.5	19
Mai 10	38.01	48	81.8	13	13.47	13	80.4	4	58.12	10	74.4	6	63.21	41	76.4	15
20	37.53	52	83.1	8	13.34	14	80.8	2	58.02	11	73.8	6	62.80	44	77.9	10
30	37.01	51	83.9	3	13.20	14	81.0	—2	57.91	11	73.2	6	62.36	45	78.9	5
Juni 9	36.50	50	84.2	—2	13.06	15	80.8	5	57.80	11	72.6	7	61.91	44	79.4	0
19	36.00	49	84.0	8	12.91	14	80.3	8	57.69	11	71.9	7	61.47	43	79.4	6
29	35.51	44	83.2	12	12.77	14	79.5	10	57.58	10	71.2	7	61.04	40	78.8	10
Juli 9	35.07	40	82.0	17	12.63	12	78.5	13	57.48	8	70.5	7	60.64	37	77.8	15
19	34.67	34	80.3	21	12.51	11	77.2	16	57.40	8	69.8	6	60.27	32	76.3	19
29	34.33	27	78.2	25	12.40	9	75.6	17	57.32	6	69.2	6	59.95	26	74.4	24
Aug. 8	34.06	21	75.7	28	12.31	7	73.9	18	57.26	4	68.6	4	59.69	21	72.0	27
18	33.85	13	72.9	31	12.24	4	72.1	18	57.22	2	68.2	3	59.48	13	69.3	29
28	33.72	4	69.8	33	12.20	0	70.3	18	57.20	0	67.9	2	59.35	7	66.4	32
Sept. 7	33.68	—6	66.5	38	12.20	5	68.5	19	57.20	4	67.7	0	59.28	—1	63.2	34
17	[13] 33.74	14	62.7	36	[14] 12.25	8	66.6	15	[15] 57.24	8	67.7	3	[17] 59.29	12	59.8	39
27	33.88	24	59.1	36	12.33	13	65.1	12	57.32	11	68.0	6	59.41	19	55.9	36
Oct. 7	34.12	34	55.5	34	12.46	17	63.9	8	57.43	15	68.6	8	59.60	27	52.3	35
17	34.46	42	52.1	33	12.63	22	63.1	5	57.58	19	69.4	11	59.87	36	48.8	33
27	34.88	52	48.8	31	12.85	27	62.6	1	57.77	23	70.5	13	60.23	44	45.5	32
Nov. 6	35.40	59	45.7	28	13.12	30	62.5	—5	58.00	26	71.8	16	60.67	52	42.3	29
16	35.99	67	42.9	24	13.42	33	63.0	9	58.26	29	73.4	19	61.19	58	39.4	25
26	36.66	71	40.5	18	13.75	35	63.9	14	58.55	32	75.3	20	61.77	63	36.9	21
Dec. 6	37.37	74	38.7	13	14.10	36	65.3	17	58.87	32	77.3	20	62.40	67	34.8	14
16	38.11	75	37.4	8	14.46	36	67.0	21	59.19	32	79.3	21	63.07	68	33.4	10
26	38.86	74	36.6	1	14.82	35	69.1	25	59.51	31	81.4	21	63.75	67	32.4	4
36	39.60		36.5		15.17		71.6		59.82		83.5		64.42		32.0	
Mittl. Ort	35.62		79.1		10.83		55.5		55.82		57.6		60.82		74.4	
	162)				581)				438)				439)			

1902	χ Ursae maj. $3^m.8$.				β Leonis. $2^m.0$.				β Virginis. $3^m.3$.				γ Ursae maj. $2^m.3$.			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	$11^h\ 40^m$		48° 18′		$11^h\ 44^m$		15° 6′		$11^h\ 45^m$		2° 18′		$11^h\ 48^m$		54° 13′	
Jan. 0	53.37	42	60.9	7	4.57	32	60.1	17	36.38	31	53.7	20	41.24	47	60.5	6
10	53.79	39	60.2	1	4.89	30	58.4	14	36.69	29	51.7	19	41.71	44	59.9	1
20	54.18	36	60.1	— 4	5.19	26	57.0	11	36.98	26	49.8	16	42.15	40	59.8	— 5
30	54.54	30	60.5	9	5.45	23	55.9	8	37.24	23	48.2	14	42.55	35	60.3	11
Febr. 9	54.84	24	61.4	13	5.68	18	55.1	4	37.47	18	46.8	11	42.90	28	61.4	15
19	55.08	17	62.7	17	5.86	14	54.7	1	37.65	13	45.7	9	43.18	20	62.9	19
März 1	55.25	11	64.4	21	6.00	10	54.6	— 2	37.78	10	44.8	6	43.38	13	64.8	23
11	55.36	5	66.5	22	6.10	5	54.8	5	37.88	5	44.2	2	43.51	6	67.1	24
21	55.41	— 1	68.7	24	6.15	1	55.3	7	37.93	2	44.0	1	43.57	— 1	69.5	26
31	55.40	7	71.1	23	6.16	— 3	56.0	9	37.95	— 2	43.9	— 1	43.56	7	72.1	26
April 10	55.33	12	73.4	23	6.13	5	56.9	10	37.93	4	44.0	3	43.49	13	74.7	24
20	55.21	15	75.7	21	6.08	8	57.9	10	37.89	6	44.3	5	43.36	18	77.1	23
30	55.06	18	77.8	18	6.00	9	58.9	10	37.83	8	44.8	5	43.18	21	79.4	20
Mai 10	54.88	20	79.6	15	5.91	11	59.9	10	37.75	10	45.3	6	42.97	24	81.4	16
20	54.68	22	81.1	12	5.80	11	60.9	9	37.65	10	45.9	7	42.73	25	83.0	13
30	54.46	22	82.3	7	5.69	12	61.8	8	37.55	11	46.6	7	42.48	26	84.3	9
Juni 9	54.24	21	83.0	4	5.57	12	62.6	7	37.44	11	47.3	7	42.22	26	85.2	4
19	54.03	21	83.4	0	5.45	11	63.3	6	37.33	10	48.0	7	41.96	26	85.6	— 1
29	53.82	19	83.4	5	5.34	11	63.9	4	37.23	10	48.7	6	41.70	24	85.5	5
Juli 9	53.63	18	82.9	8	5.23	10	64.3	2	37.13	10	49.3	6	41.46	22	85.0	9
19	53.45	16	82.1	13	5.13	9	64.5	1	37.03	8	49.9	5	41.24	20	84.1	14
29	53.29	13	80.8	16	5.04	7	64.6	— 1	36.95	7	50.4	5	41.04	16	82.7	17
Aug. 8	53.16	10	79.2	19	4.97	6	64.5	4	36.88	5	50.9	3	40.88	13	81.0	21
18	53.06	6	77.3	22	4.91	3	64.1	5	36.83	3	51.2	1	40.75	9	78.9	24
28	53.00	2	75.1	25	4.88	1	63.6	7	36.80	1	51.3	0	40.66	5	76.5	27
Sept. 7	52.98	— 2	72.6	27	4.87	— 3	62.9	10	36.79	— 3	51.3	2	40.61	0	73.8	30
17	53.00	8	69.9	32	4.90	7	61.9	13	36.82	7	51.1	5	40.61	7	70.8	34
27	[13] 53.08	13	66.7	30	[19] 4.97	10	60.6	15	[19] 36.89	10	50.6	7	[20] 40.68	12	67.4	32
Oct. 7	53.21	17	63.7	31	5.07	13	59.1	16	36.99	14	49.9	9	40.80	19	64.2	33
17	53.38	24	60.6	31	5.20	19	57.5	19	37.13	17	49.0	13	40.99	24	60.9	33
27	53.62	28	57.5	30	5.39	22	55.6	20	37.30	22	47.7	15	41.23	30	57.6	31
Nov. 6	53.90	33	54.5	29	5.61	25	53.6	22	37.52	26	46.2	16	41.53	36	54.5	30
16	54.23	38	51.6	26	5.86	29	51.4	22	37.78	28	44.6	19	41.89	40	51.5	27
26	54.61	41	49.0	23	6.15	31	49.2	22	38.06	31	42.7	21	42.29	45	48.8	24
Dec. 6	55.02	42	46.7	19	6.46	33	47.0	21	38.37	32	40.6	21	42.74	47	46.4	20
16	55.44	44	44.8	14	6.79	33	44.9	20	38.69	33	38.5	21	43.21	48	44.4	14
26	55.88	43	43.4	10	7.12	33	42.9	19	39.02	32	36.4	20	43.69	48	43.0	9
36	56.31		42.4		7.45		41.0		39.34		34.4		44.17		42.1	
Mittl. Ort	52.69		82.0		3.66		71.8		35.38		61.1		40.71		82.5	
	163)				164)				165)				166)			

1902	ο Virginis. 4ᵐ.0. AR.		Decl. +		ε Corvi. 3ᵐ.0. AR.		Decl. —	
	12ʰ 0ᵐ		9° 16′		12ʰ 5ᵐ		22° 4′	
Jan. 0	13.89	32	28.8	19	6.11	33	27.8	23
10	14.21	30	26.9	17	6.44	32	30.1	23
20	14.51	27	25.2	14	6.76	28	32.4	24
30	14.78	23	23.8	11	7.04	24	34.8	24
Febr. 9	15.01	20	22.7	7	7.28	20	37.2	23
19	15.21	15	22.0	5	7.48	16	39.5	22
März 1	15.36	11	21.5	1	7.64	12	41.7	19
11	15.47	7	21.4	— 1	7.76	8	43.6	17
21	15.54	3	21.5	4	7.84	3	45.3	15
31	15.57	— 1	21.9	5	7.87	0	46.8	13
April 10	15.56	4	22.4	7	7.87	3	48.1	11
20	15.52	5	23.1	8	7.84	5	49.2	8
30	15.47	8	23.9	9	7.79	8	50.0	5
Mai 10	15.39	10	24.8	9	7.71	9	50.5	3
20	15.29	10	25.7	8	7.62	10	50.8	0
30	15.19	10	26.5	9	7.52	11	50.8	2
Juni 9	15.09	12	27.4	7	7.41	13	50.6	4
19	14.97	11	28.1	7	7.28	12	50.2	6
29	14.86	11	28.8	5	7.16	12	49.6	8
Juli 9	14.75	10	29.3	5	7.04	12	48.8	10
19	14.65	9	29.8	3	6.92	11	47.8	12
29	14.56	8	30.1	1	6.81	10	46.6	12
Aug. 8	14.48	7	30.2	0	6.71	8	45.4	13
18	14.41	5	30.2	2	6.63	7	44.1	14
28	14.36	2	30.0	4	6.56	3	42.7	13
Sept. 7	14.34	— 1	29.6	6	6.53	0	41.4	12
17	14.35	5	29.0	9	6.53	5	40.2	11
27	[23] 14.40	8	28.1	11	[24] 6.58	8	39.1	7
Oct. 7	14.48	13	27.0	13	6.66	13	38.4	5
17	14.61	16	25.7	16	6.79	18	37.9	1
27	14.77	21	24.1	18	6.97	22	37.8	— 2
Nov. 6	14.98	24	22.3	20	7.19	26	38.0	6
16	15.22	28	20.3	21	7.45	29	38.6	10
26	15.50	30	18.2	21	7.74	32	39.6	13
Dec. 6	15.80	32	16.1	22	8.06	34	40.9	17
16	16.12	33	13.9	21	8.40	35	42.6	20
26	16.45	32	11.8	20	8.75	33	44.6	23
36	16.77		9.8		9.08		46.9	
Mittl. Ort	13.04		38.1		4.98		29.5	
	167)				582)			

1902	4 H.Draconis. 4ᵐ.6. AR.		Decl. +		δ Ursae maj. 3ᵐ.4. AR.		Decl. +	
	12ʰ 7ᵐ		78° 8′		12ʰ 10ᵐ		57° 33′	
Jan. 0	35.92	115	74.6	1	34.95	51	75.1	8
10	37.07	112	74.5	— 5	35.46	49	74.3	1
20	38.19	102	75.0	11	35.95	45	74.2	— 5
30	39.21	90	76.1	18	36.40	39	74.7	10
Febr. 9	40.11	74	77.9	22	36.79	33	75.7	15
19	40.85	56	80.1	26	37.12	25	77.2	20
März 1	41.41	37	82.7	29	37.37	17	79.2	23
11	41.78	16	85.6	31	37.54	10	81.5	26
21	41.94	— 4	88.7	32	37.64	3	84.1	27
31	41.90	23	91.9	31	37.67	— 5	86.8	27
April 10	41.67	41	95.0	28	37.62	11	89.5	27
20	41.26	57	97.8	26	37.51	17	92.2	25
30	40.69	69	100.4	22	37.34	21	94.7	22
Mai 10	40.00	80	102.6	17	37.13	25	96.9	18
20	39.20	88	104.3	13	36.88	27	98.7	14
30	38.32	92	105.6	7	36.61	29	100.1	10
Juni 9	37.40	93	106.3	2	36.32	30	101.1	6
19	36.47	93	106.5	— 4	36.02	29	101.7	1
29	35.54	90	106.1	10	35.73	29	101.8	— 3
Juli 9	34.64	85	105.1	15	35.44	27	101.5	9
19	33.79	77	103.6	19	35.17	24	100.6	13
29	33.02	68	101.7	24	34.93	22	99.3	17
Aug. 8	32.34	57	99.3	28	34.71	19	97.6	21
18	31.77	45	96.5	30	34.52	14	95.5	25
28	31.32	33	93.5	34	34.38	9	93.0	28
Sept. 7	30.99	18	90.1	36	34.29	5	90.2	30
17	30.81	2	86.5	41	34.24	— 2	87.2	35
27	[25] 30.79	— 15	82.4	37	[26] 34.26	8	83.7	34
Oct. 7	30.94	30	78.7	37	34.34	15	80.3	35
17	31.24	47	75.0	37	34.49	22	76.8	34
27	31.71	64	71.3	34	34.71	28	73.4	33
Nov. 6	32.35	78	67.9	31	34.99	35	70.1	32
16	33.13	91	64.8	27	35.34	41	66.9	29
26	34.04	103	62.1	23	35.75	45	64.0	26
Dec. 6	35.07	112	59.8	17	36.20	49	61.4	21
16	36.19	117	58.1	11	36.69	51	59.3	16
26	37.36	118	57.0	5	37.20	52	57.7	10
36	38.54		56.5		37.72		56.7	
Mittl. Ort	36.82		99.2		34.76		97.3	
	168)				169)			

1902	η Virginis. 3ᵐ.3. AR.	Δ	Decl. —	Δ	δ Corvi. 2ᵐ.3. AR.	Δ	Decl. —	Δ	20 Comae. 6ᵐ.0. AR.	Δ	Decl. +	Δ	8 Canum ven. 4ᵐ.3. AR.	Δ	Decl. +	Δ
	12ʰ 14ᵐ		0° 7′		12ʰ 24ᵐ		15° 58′		12ʰ 24ᵐ		21° 25′		12ʰ 29ᵐ		41° 52′	
Jan. 0	54.32ˢ	32	26.0″	21	48.54ˢ	33	12.0″	22	48.57ˢ	34	67.1″	17	5.69ˢ	40	65.0″	13
10	54.64	30	28.1	19	48.87	31	14.2	22	48.91	32	65.4	14	6.09	38	63.7	8
20	54.94	28	30.0	18	49.18	29	16.4	22	49.23	30	64.0	10	6.47	35	62.9	3
30	55.22	24	31.8	15	49.47	25	18.6	21	49.53	26	63.0	7	6.82	31	62.6	— 2
Febr. 9	55.46	20	33.3	13	49.72	21	20.7	20	49.79	23	62.3	2	7.13	27	62.8	8
19	55.66	17	34.6	10	49.93	18	22.7	18	50.02	18	62.1	— 2	7.40	22	63.6	12
März 1	55.83	12	35.6	7	50.11	14	24.5	16	50.20	13	62.3	5	7.62	16	64.8	16
11	55.95	8	36.3	4	50.25	9	26.1	14	50.33	10	62.8	9	7.78	11	66.4	19
21	56.03	5	36.7	2	50.34	6	27.5	12	50.43	5	63.7	11	7.89	5	68.3	21
31	56.08	1	36.9	0	50.40	2	28.7	9	50.48	2	64.8	12	7.94	1	70.4	23
April 10	56.09	— 2	36.9	2	50.42	— 1	29.6	7	50.50	— 2	66.0	14	7.95	— 5	72.7	23
20	56.07	4	36.7	4	50.41	3	30.3	5	50.48	5	67.4	15	7.90	8	75.0	22
30	56.03	6	36.3	5	50.38	5	30.8	3	50.43	7	68.9	14	7.82	11	77.2	21
Mai 10	55.97	8	35.8	5	50.33	7	31.1	1	50.36	9	70.3	13	7.71	14	79.3	19
20	55.89	9	35.3	7	50.26	9	31.2	— 1	50.27	10	71.6	12	7.57	16	81.2	16
30	55.80	10	34.6	6	50.17	10	31.1	3	50.17	12	72.8	11	7.41	17	82.8	13
Juni 9	55.70	11	34.0	7	50.07	11	30.8	5	50.05	12	73.9	9	7.24	19	84.1	9
19	55.59	10	33.3	8	49.96	12	30.3	6	49.93	13	74.8	7	7.05	18	85.0	5
29	55.49	11	32.5	6	49.84	12	29.7	7	49.80	12	75.5	5	6.87	19	85.5	2
Juli 9	55.38	11	31.9	7	49.72	11	29.0	8	49.68	12	76.0	2	6.68	18	85.7	— 3
19	55.27	10	31.2	6	49.61	12	28.2	10	49.56	12	76.2	0	6.50	17	85.4	6
29	55.17	9	30.6	5	49.49	10	27.2	10	49.44	11	76.2	3	6.33	16	84.8	10
Aug. 8	55.08	7	30.1	4	49.39	9	26.2	10	49.33	9	75.9	5	6.17	13	83.8	13
18	55.01	6	29.7	3	49.30	7	25.2	10	49.24	7	75.4	8	6.04	11	82.5	17
28	54.95	4	29.4	1	49.23	5	24.2	10	49.17	5	74.6	10	5.93	8	80.8	21
Sept. 7	54.91	0	29.3	0	49.18	2	23.2	8	49.12	2	73.6	13	5.85	5	78.7	23
17	54.91	2	29.3	3	49.16	— 2	22.4	7	49.10	— 1	72.3	15	5.80	0	76.4	25
27	54.93	8	29.6	6	49.18	7	21.7	5	49.11	6	70.8	20	5.80	4	73.9	31
Oct. 7	[27] 55.01	11	30.2	8	[30] 49.25	10	21.2	1	[30] 49.17	10	68.8	20	[1] 5.84	10	70.8	30
17	55.12	15	31.0	11	49.35	15	21.1	— 2	49.27	15	66.8	22	5.94	15	67.8	31
27	55.27	20	32.1	13	49.50	20	21.3	4	49.42	19	64.6	22	6.09	20	64.7	31
Nov. 6	55.47	23	33.4	15	49.70	24	21.7	8	49.61	23	62.2	24	6.29	26	61.6	30
16	55.70	27	34.9	18	49.94	28	22.5	12	49.84	26	59.8	25	6.55	30	58.6	29
26	55.97	30	36.7	20	50.22	30	23.7	15	50.10	30	57.3	25	6.85	34	55.7	27
Dec. 6	56.27	31	38.7	21	50.52	32	25.2	17	50.40	33	54.8	23	7.19	37	53.0	24
16	56.58	33	40.8	21	50.84	34	26.9	19	50.73	34	52.5	21	7.56	39	50.6	21
26	56.91	32	42.9	21	51.18	33	28.8	21	51.07	34	50.4	19	7.95	39	48.5	16
36	57.23		45.0		51.51		30.9		51.41		48.5		8.34		46.9	
Mittl. Ort	53.47		20.5		47.59		12.4		47.99		79.7		5.40		83.4	
	170)				584)				443)				445)			

1902	β Corvi. $2^m.3$.				κ Draconis. $3^m.3$.				24 Comae seq. $5^m.2$.				76 Ursae maj. $6^m.0$.			
	AR.		Decl. −		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	$12^h\ 29^m$		$22°\ 51'$		$12^h\ 29^m$		$70°\ 19'$		$12^h\ 30^m$		$18°\ 54'$		$12^h\ 37^m$		$63°\ 14'$	
Jan. 0	15.15	35	15.1	22	17.37	75	18.4	7	13.47	33	48.0	18	16.78	59	41.4	10
10	15.50	32	17.3	23	18.12	73	17.7	1	13.80	32	46.2	15	17.37	57	40.4	3
20	15.82	29	19.6	23	18.85	68	17.8	6	14.12	30	44.7	12	17.94	54	40.1	3
30	16.11	27	21.9	23	19.53	61	18.4	13	14.42	26	43.5	7	18.48	48	40.4	10
Febr. 9	16.38	23	24.2	23	20.14	52	19.7	18	14.68	23	42.8	3	18.96	42	41.4	16
19	16.61	18	26.5	21	20.66	42	21.5	23	14.91	18	42.5	0	19.38	34	43.0	20
März 1	16.79	15	28.6	20	21.08	30	23.8	26	15.09	15	42.5	4	19.72	25	45.0	24
11	16.94	10	30.6	17	21.38	18	26.4	29	15.24	10	42.9	6	19.97	17	47.4	27
21	17.04	6	32.3	16	21.56	5	29.3	31	15.34	5	43.5	10	20.14	7	50.1	28
31	17.10	3	33.9	13	21.61	6	32.4	30	15.39	2	44.5	12	20.21	2	52.9	30
April 10	17.13	0	35.2	11	21.55	17	35.4	30	15.41	1	45.7	12	20.19	10	55.9	29
20	17.13	3	36.3	8	21.38	28	38.4	27	15.40	4	46.9	14	20.09	17	58.8	27
30	17.10	5	37.1	7	21.10	35	41.1	24	15.36	6	48.3	13	19.92	22	61.5	25
Mai 10	17.05	8	37.8	4	20.75	42	43.5	21	15.30	8	49.6	13	19.70	29	64.0	21
20	16.97	9	38.2	1	20.33	48	45.6	16	15.22	10	50.9	12	19.41	32	66.1	18
30	16.88	10	38.3	0	19.85	51	47.2	11	15.12	11	52.1	11	19.09	35	67.9	13
Juni 9	16.78	12	38.3	3	19.34	53	48.3	6	15.01	12	53.2	9	18.74	37	69.2	8
19	16.66	12	38.0	5	18.81	53	48.9	0	14.89	12	54.1	7	18.37	38	70.0	3
29	16.54	13	37.5	7	18.28	53	48.9	4	14.77	12	54.8	5	17.99	37	70.3	2
Juli 9	16.41	12	36.8	9	17.75	51	48.5	10	14.65	12	55.3	3	17.62	36	70.1	7
19	16.29	12	35.9	10	17.24	48	47.5	15	14.53	12	55.6	1	17.26	35	69.4	12
29	16.17	12	34.9	12	16.76	43	46.0	19	14.41	11	55.7	1	16.91	31	68.2	17
Aug. 8	16.05	10	33.7	12	16.33	38	44.1	24	14.30	9	55.6	4	16.60	28	66.5	20
18	15.95	8	32.5	13	15.95	31	41.7	28	14.21	8	55.2	7	16.32	24	64.5	25
28	15.87	6	31.2	13	15.64	24	38.9	30	14.13	5	54.5	9	16.08	18	62.0	29
Sept. 7	15.81	2	29.9	12	15.40	16	35.9	34	14.08	2	53.6	11	15.90	12	59.1	31
17	15.79	1	28.7	10	15.24	7	32.5	35	14.06	0	52.5	14	15.78	6	56.0	33
27	15.80	7	27.7	9	15.17	4	29.0	41	14.06	6	51.1	18	15.72	2	52.7	39
Oct. 7	[1] 15.87	10	26.8	6	[1] 15.21	14	24.9	37	[1] 14.12	9	49.3	19	[3] 15.74	10	48.8	36
17	15.97	16	26.2	3	15.35	24	21.2	37	14.21	14	47.4	21	15.84	18	45.2	36
27	16.13	20	25.9	1	15.59	35	17.5	35	14.35	18	45.3	22	16.02	26	41.6	36
Nov. 6	16.33	24	26.0	5	15.94	46	14.0	34	14.53	23	43.1	24	16.28	35	38.0	34
16	16.57	28	26.5	8	16.40	54	10.6	30	14.76	26	40.7	24	16.63	42	34.6	31
26	16.85	31	27.3	11	16.94	63	7.6	26	15.02	29	38.3	24	17.05	48	31.5	28
Dec. 6	17.16	34	28.4	16	17.57	69	5.0	21	15.31	32	35.9	23	17.53	53	28.7	23
16	17.50	34	30.0	19	18.26	73	2.9	16	15.63	33	33.6	22	18.06	57	26.4	18
26	17.84	34	31.9	20	18.99	76	1.3	10	15.96	34	31.4	20	18.63	59	24.6	13
36	18.18		33.9		19.75		0.3		16.30		29.4		19.22		23.3	
Mittl. Ort	14.15		18.1		18.03		41.8		12.89		59.6		17.16		63.6	
	585)				171)				446)				447)			

1902	ε Ursae maj. 2ᵐ.0 AR.		Decl. +		δ Virginis. 3ᵐ.0 AR.		Decl. +		12 Can.ven.sq. 2ᵐ.9 AR.		Decl. +		8 Draconis. 5ᵐ.0 AR.		Decl. +	
	12h 49m		56° 28′		12h 50m		3° 55′		12h 51m		38° 50′		12h 51m		65° 57′	
Jan. 0	42.86	50	68.2	13	40.53	33	42.1	20	26.82	38	34.7	16	33.96	63	49.6	11
10	43.36	48	66.9	6	40.86	31	40.1	19	27.20	37	33.1	12	34.59	63	48.5	4
20	43.84	46	66.3	0	41.17	29	38.2	16	27.57	35	31.9	6	35.22	59	48.1	3
30	44.30	42	66.3	6	41.46	27	36.6	14	27.92	33	31.3	0	35.81	54	48.4	8
Febr. 9	44.72	37	66.9	11	41.73	23	35.2	11	28.25	28	31.3	5	36.35	48	49.2	15
19	45.09	31	68.0	17	41.96	19	34.1	8	28.53	23	31.8	9	36.83	40	50.7	20
März 1	45.40	24	69.7	22	42.15	16	33.3	5	28.76	18	32.7	14	37.23	30	52.7	24
11	45.64	16	71.9	24	42.31	11	32.8	2	28.94	14	34.1	17	37.53	21	55.1	27
21	45.80	9	74.3	27	42.42	8	32.6	1	29.08	9	35.8	20	37.74	11	57.8	29
31	45.89	2	77.0	28	42.50	5	32.7	3	29.17	3	37.8	22	37.85	1	60.7	31
April 10	45.91	5	79.8	28	42.55	2	33.0	5	29.20	1	40.0	22	37.86	9	63.8	30
20	45.86	10	82.6	27	42.57	2	33.5	6	29.19	5	42.2	22	37.77	16	66.8	28
30	45.76	16	85.3	25	42.55	3	34.1	8	29.14	9	44.4	22	37.61	24	69.6	26
Mai 10	45.60	20	87.8	22	42.52	6	34.9	8	29.05	11	46.6	20	37.37	30	72.2	23
20	45.40	23	90.0	18	42.46	7	35.7	8	28.94	13	48.6	17	37.07	35	74.5	19
30	45.17	26	91.8	15	42.39	9	36.5	8	28.81	15	50.3	15	36.72	39	76.4	14
Juni 9	44.91	28	93.3	11	42.30	10	37.3	8	28.66	16	51.8	11	36.33	41	77.8	10
19	44.63	29	94.4	5	42.20	10	38.1	8	28.50	18	52.9	8	35.92	43	78.8	4
29	44.34	29	94.9	1	42.10	12	38.9	7	28.32	17	53.7	3	35.49	43	79.2	1
Juli 9	44.05	28	95.0	4	41.98	11	39.6	6	28.15	18	54.0	0	35.06	43	79.1	6
19	43.77	27	94.6	9	41.87	11	40.2	5	27.97	17	54.0	3	34.63	40	78.5	11
29	43.50	26	93.7	13	41.76	12	40.7	4	27.80	16	53.7	8	34.23	38	77.4	16
Aug. 8	43.24	24	92.4	17	41.64	10	41.1	2	27.64	15	52.9	11	33.85	35	75.8	20
18	43.00	20	90.7	22	41.54	8	41.3	1	27.49	13	51.8	15	33.50	29	73.8	25
28	42.80	16	88.5	25	41.46	7	41.4	1	27.36	10	50.3	17	33.21	24	71.3	28
Sept. 7	42.64	11	86.0	28	41.39	4	41.3	2	27.26	7	48.6	21	32.97	18	68.5	31
17	42.53	6	83.2	31	41.35	1	41.1	6	27.19	3	46.5	24	32.79	11	65.4	33
27	42.47	1	80.1	34	41.34	2	40.5	7	27.16	1	44.1	26	32.68	2	62.1	36
Oct. 7	42.46	8	76.7	38	41.36	8	39.8	11	27.17	8	41.5	32	32.66	7	58.5	40
17	42.54	13	72.9	35	41.44	12	38.7	13	27.25	12	38.3	30	32.73	15	54.5	37
27	42.67	21	69.4	35	41.56	16	37.4	15	27.37	17	35.3	30	32.88	25	50.8	37
Nov. 6	42.88	28	65.9	34	41.72	21	35.9	17	27.54	22	32.3	31	33.13	34	47.1	35
16	43.16	34	62.5	32	41.93	24	34.2	19	27.76	27	29.2	30	33.47	42	43.6	32
26	43.50	40	59.3	29	42.17	28	32.3	21	28.03	31	26.2	28	33.89	50	40.4	29
Dec. 6	43.90	45	56.4	26	42.45	30	30.2	21	28.34	35	23.4	26	34.39	56	37.5	24
16	44.35	48	53.8	21	42.75	32	28.1	21	28.69	37	20.8	23	34.95	60	35.1	20
26	44.83	49	51.7	15	43.07	32	26.0	21	29.06	38	18.5	18	35.55	63	33.1	14
36	45.32		50.2		43.39		23.9		29.44		16.7		36.18		31.7	
Mittl. Ort	43.13		88.9		39.94		47.9		26.66		51.4		34.72		71.7	
	173)				174)				175)				448)			

1902	ε Virginis. 2ᵐ.6.				ϑ Virginis. 4ᵐ.3.				43 Comae. 4ᵐ.1.				γ Hydrae. 3ᵐ.2.			
	AR.		Decl. +		AR.		Decl. —		AR.		Decl. +		AR.		Decl. —	
	$12^h\ 57^m$		11° 28′		$13^h\ 4^m$		5° 0′		$13^h\ 7^m$		28° 21′		$13^h\ 13^m$		22° 39′	
Jan. 0	$18^s.39$	33	60″.7	20	$53^s.04$	33	59″.3	20	$18^s.28$	35	76″.3	19	$36^s.14$	35	12″.6	19
10	18.72	32	58.7	17	53.37	32	61.3	20	18.63	34	74.4	14	36.49	34	14.5	20
20	19.04	29	57.0	15	53.69	30	63.3	19	18.97	32	73.0	10	36.83	32	16.5	21
30	19.33	27	55.5	12	53.99	27	65.2	17	19.29	30	72.0	5	37.15	29	18.6	21
Febr. 9	19.60	24	54.3	7	54.26	24	66.9	14	19.59	27	71.5	1	37.44	26	20.7	21
19	19.84	21	53.6	4	54.50	21	68.3	12	19.86	23	71.4	— 4	37.70	23	22.8	20
März 1	20.05	16	53.2	1	54.71	17	69.5	10	20.09	18	71.8	9	37.93	19	24.8	18
11	20.21	12	53.1	— 3	54.88	13	70.5	7	20.27	14	72.7	12	38.12	15	26.6	16
21	20.33	9	53.4	5	55.01	10	71.2	5	20.41	10	73.9	15	38.27	12	28.2	15
31	20.42	5	53.9	8	55.11	6	71.7	2	20.51	5	75.4	17	38.39	8	29.7	13
April 10	20.47	2	54.7	9	55.17	3	71.9	1	20.56	2	77.1	18	38.47	4	31.0	11
20	20.49	— 1	55.6	10	55.20	1	72.0	— 2	20.58	— 2	78.9	19	38.51	1	32.1	8
30	20.48	3	56.6	11	55.21	— 2	71.8	3	20.56	5	80.8	19	38.52	— 1	32.9	7
Mai 10	20.45	6	57.7	11	55.19	4	71.5	4	20.51	7	82.7	18	38.51	3	33.6	5
20	20.39	7	58.8	11	55.15	6	71.1	5	20.44	9	84.5	17	38.48	6	34.1	3
30	20.32	10	59.9	11	55.09	8	70.6	6	20.35	11	86.2	15	38.42	8	34.4	1
Juni 9	20.22	10	61.0	9	55.01	9	70.0	6	20.24	13	87.7	12	38.34	9	34.5	— 2
19	20.12	11	61.9	9	54.92	10	69.4	7	20.11	14	88.9	9	38.25	11	34.3	3
29	20.01	11	62.8	7	54.82	11	68.7	7	19.97	15	89.8	7	38.14	13	34.0	5
Juli 9	19.90	12	63.5	5	54.71	11	68.0	6	19.82	15	90.5	4	38.01	13	33.5	7
19	19.78	13	64.0	4	54.60	12	67.4	7	19.67	15	90.9	0	37.88	14	32.8	8
29	19.65	11	64.4	1	54.48	12	66.7	6	19.52	14	90.9	3	37.74	13	32.0	9
Aug. 8	19.54	11	64.5	0	54.36	11	66.1	6	19.38	14	90.6	5	37.61	12	31.1	10
18	19.43	9	64.5	2	54.25	9	65.5	5	19.24	12	90.1	10	37.49	12	30.1	11
28	19.34	8	64.3	5	54.16	8	65.0	3	19.12	10	89.1	12	37.37	9	29.0	11
Sept. 7	19.26	5	63.8	7	54.08	6	64.7	2	19.02	7	87.9	15	37.28	7	27.9	11
17	19.21	1	63.1	9	54.02	2	64.5	1	18.95	4	86.4	18	37.21	3	26.8	10
27	19.20	— 2	62.2	12	54.00	— 2	64.4	— 2	18.91	0	84.6	21	37.18	— 1	25.8	9
Oct. 7	19.22	7	61.0	16	54.02	7	64.6	5	18.91	5	82.5	26	37.19	6	24.9	7
17	[9] 19.29	10	59.4	17	[11] 54.09	10	65.1	7	[12] 18.96	9	79.9	25	[13] 37.25	11	24.2	4
27	19.39	16	57.7	19	54.19	15	65.8	10	19.05	15	77.4	26	37.36	16	23.8	0
Nov. 6	19.55	20	55.8	20	54.34	20	66.8	13	19.20	19	74.8	28	37.52	21	23.8	2
16	19.75	24	53.8	22	54.54	24	68.1	15	19.39	24	72.0	28	37.73	25	24.0	6
26	19.99	27	51.6	23	54.78	27	69.6	17	19.63	28	69.2	27	37.98	29	24.6	10
Dec. 6	20.26	30	49.3	23	55.05	30	71.3	18	19.91	31	66.5	26	38.27	32	25.6	12
16	20.56	32	47.0	22	55.35	32	73.1	20	20.22	33	63.9	23	38.59	33	26.8	16
26	20.88	32	44.8	21	55.67	33	75.1	21	20.55	35	61.6	20	38.92	35	28.4	18
36	21.20		42.7		56.00		77.2		20.90		59.6		39.27		30.2	
Mittl. Ort	17.91		68.8		52.44		57.3		18.07		89.5		35.41		17.0	
	176)				449)				177)				586)			

1902	ζ Urs. maj. pr. 2^m.1. AR.		Decl. +		α Virginis. 1^m. AR.		Decl. —		Gr. 2001. 5^m.7. AR.		Decl. +		69 H. Urs. maj. 5^m.3. AR.		Decl. +	
	13^h 19^m		55° 25′		13^h 20^m		10° 38′		13^h 23^m		72° 53′		13^h 24^m		60° 26′	
Jan. 0	58.25	48	54.2	16	2.26	33	59.3	20	35.84	82	39.9	14	50.54	53	46.1	16
10	58.73	48	52.6	10	2.59	32	61.3	20	36.66	83	38.5	6	51.07	53	44.5	9
20	59.21	46	51.6	4	2.91	31	63.3	19	37.49	81	37.9	— 1	51.60	52	43.6	3
30	59.67	44	51.2	— 3	3.22	29	65.2	18	38.30	77	38.0	6	52.12	49	43.3	— 3
Febr. 9	60.11	39	51.5	8	3.51	25	67.0	16	39.07	69	38.6	13	52.61	44	43.6	9
19	60.50	33	52.3	14	3.76	22	68.6	15	39.76	60	39.9	19	53.05	38	44.5	16
März 1	60.83	27	53.7	19	3.98	19	70.1	12	40.36	49	41.8	24	53.43	32	46.1	20
11	61.10	21	55.6	23	4.17	15	71.3	10	40.85	36	44.2	27	53.75	24	48.1	24
21	61.31	15	57.9	26	4.32	11	72.3	8	41.21	22	46.9	30	53.99	16	50.5	28
31	61.46	7	60.5	28	4.43	8	73.1	5	41.43	9	49.9	31	54.15	8	53.3	29
April 10	61.53	0	63.3	29	4.51	5	73.6	4	41.52	— 4	53.0	31	54.23	1	56.2	29
20	61.53	5	66.2	28	4.56	2	74.0	2	41.48	16	56.1	31	54.24	— 7	59.1	30
30	61.48	11	69.0	26	4.58	0	74.2	0	41.32	28	59.2	29	54.17	13	62.1	28
Mai 10	61.37	16	71.6	25	4.58	3	74.2	2	41.04	38	62.1	25	54.04	19	64.9	25
20	61.21	19	74.1	22	4.55	5	74.0	3	40.66	47	64.6	22	53.85	23	67.4	22
30	61.02	23	76.3	18	4.50	7	73.7	3	40.19	53	66.8	18	53.62	28	69.6	19
Juni 9	60.79	26	78.1	14	4.43	8	73.4	5	39.66	59	68.6	12	53.34	31	71.5	14
19	60.53	27	79.5	9	4.35	10	72.9	5	39.07	63	69.8	8	53.03	33	72.9	9
29	60.26	28	80.4	5	4.25	11	72.4	7	38.44	65	70.6	2	52.70	34	73.8	5
Juli 9	59.98	29	80.9	— 1	4.14	12	71.7	7	37.79	65	70.8	— 4	52.36	35	74.3	— 1
19	59.69	29	80.8	5	4.02	12	71.0	7	37.14	64	70.4	8	52.01	35	74.2	5
29	59.40	28	80.3	9	3.90	13	70.3	7	36.50	62	69.6	14	51.66	34	73.7	11
Aug. 8	59.12	26	79.4	14	3.77	12	69.6	7	35.88	58	68.2	19	51.32	31	72.6	15
18	58.86	23	78.0	19	3.65	10	68.9	7	35.30	52	66.3	23	51.01	29	71.1	20
28	58.63	21	76.1	23	3.55	9	68.2	6	34.78	45	64.0	26	50.72	25	69.1	23
Sept. 7	58.42	16	73.8	26	3.46	7	67.6	5	34.33	38	61.4	31	50.47	21	66.8	28
17	58.26	11	71.2	29	3.39	4	67.1	3	33.95	28	58.3	34	50.26	15	64.0	30
27	58.15	6	68.3	33	3.35	0	66.8	1	33.67	18	54.9	36	50.11	9	61.0	34
Oct. 7	58.09	— 1	65.0	37	3.35	5	66.7	— 1	33.49	6	51.3	41	50.02	1	57.6	39
17	[15] 58.10	8	61.3	35	[15] 3.40	10	66.8	3	[16] 33.43	— 8	47.2	38	[16] 50.01	— 7	53.7	36
27	58.18	15	57.8	36	3.50	14	67.1	6	33.51	20	43.4	38	50.08	15	50.1	37
Nov. 6	58.33	22	54.2	35	3.64	19	67.7	9	33.71	33	39.6	36	50.23	23	46.4	36
16	58.55	29	50.7	34	3.83	23	68.6	12	34.04	45	36.0	34	50.46	31	42.8	35
26	58.84	35	47.3	32	4.06	27	69.8	14	34.49	56	32.6	32	50.77	38	39.3	32
Dec. 6	59.19	41	44.1	28	4.33	29	71.2	17	35.05	66	29.4	27	51.15	44	36.1	28
16	59.60	44	41.3	24	4.62	32	72.9	18	35.71	75	26.7	22	51.59	49	33.3	24
26	60.04	47	38.9	19	4.94	33	74.7	19	36.46	80	24.5	16	52.08	52	30.9	19
36	60.51		37.0		5.27		76.6		37.26		22.9		52.60		29.0	
Mittl. Ort	58.83		73.4		1.69		59.8		37.96		61.1		51.43		65.8	
	178)				587)				452)				453)			

1902	ζ Virginis. $3^m.3$. AR.		Decl. −		17 H.Can.ven. $5^m.5$. AR.		Decl. +		τ Bootis. $4^m.6$. AR.		Decl. +		η Ursae maj. $2^m.0$. AR.		Decl. +	
	$13^h\ 29^m$		$0°\ 5'$		$13^h\ 30^m$		$37°\ 40'$		$13^h\ 42^m$		$17°\ 56'$		$13^h\ 43^m$		$49°\ 47'$	
Jan. 0	42.30	32	44.4	20	25.08	38	48.8	20	36.44	33	33.8	21	40.26	42	51.3	19
10	42.62	32	46.4	20	25.46	37	46.8	14	36.77	32	31.7	18	40.68	43	49.4	14
20	42.94	30	48.4	17	25.83	35	45.4	10	37.09	32	29.9	15	41.11	42	48.0	8
30	43.24	29	50.1	15	26.18	34	44.4	4	37.41	30	28.4	10	41.53	40	47.2	1
Febr. 9	43.53	26	51.6	13	26.52	31	44.0	−1	37.71	27	27.4	7	41.93	37	47.1	−4
19	43.79	22	52.9	10	26.83	27	44.1	7	37.98	24	26.7	2	42.30	33	47.5	10
März 1	44.01	19	53.9	6	27.10	22	44.8	11	38.22	21	26.5	−2	42.63	27	48.5	15
11	44.20	15	54.5	4	27.32	17	45.9	16	38.43	17	26.7	6	42.90	22	50.0	20
21	44.35	12	54.9	2	27.49	13	47.5	19	38.60	13	27.3	9	43.12	16	52.0	23
31	44.47	9	55.1	−1	27.62	9	49.4	21	38.73	9	28.2	11	43.28	11	54.3	26
April 10	44.56	5	55.0	3	27.71	3	51.5	22	38.82	6	29.3	14	43.39	5	56.9	28
20	44.61	3	54.7	5	27.74	0	53.7	24	38.88	3	30.7	14	43.44	−1	59.7	28
30	44.64	0	54.2	6	27.74	3	56.1	23	38.91	0	32.1	16	43.43	5	62.5	27
Mai 10	44.64	2	53.6	6	27.71	8	58.4	22	38.91	3	33.7	16	43.38	10	65.2	25
20	44.62	5	53.0	8	27.63	10	60.6	20	38.88	5	35.3	15	43.28	14	67.7	23
30	44.57	6	52.2	8	27.53	12	62.6	18	38.83	7	36.8	14	43.14	17	70.0	20
Juni 9	44.51	8	51.4	7	27.41	14	64.4	15	38.76	9	38.2	12	42.97	19	72.0	17
19	44.43	10	50.7	8	27.27	16	65.9	11	38.67	11	39.4	11	42.78	22	73.7	13
29	44.33	11	49.9	7	27.11	18	67.0	7	38.56	12	40.5	9	42.56	24	75.0	8
Juli 9	44.22	11	49.2	7	26.93	18	67.7	4	38.44	14	41.4	7	42.32	25	75.8	3
19	44.11	12	48.5	6	26.75	19	68.1	0	38.30	14	42.1	4	42.07	25	76.1	−1
29	43.99	13	47.9	5	26.56	18	68.1	4	38.16	14	42.5	2	41.82	25	76.0	6
Aug. 8	43.86	12	47.4	4	26.38	17	67.7	8	38.02	14	42.7	−1	41.57	24	75.4	10
18	43.74	12	47.0	3	26.21	16	66.9	11	37.88	13	42.6	4	41.33	23	74.4	15
28	43.62	10	46.7	1	26.05	14	65.8	15	37.75	12	42.2	6	41.10	20	72.9	19
Sept. 7	43.52	7	46.6	0	25.91	11	64.3	19	37.63	9	41.6	10	40.90	17	71.0	22
17	43.45	4	46.6	2	25.80	8	62.4	22	37.54	7	40.6	12	40.73	13	68.8	26
27	43.41	1	46.8	5	25.72	4	60.2	25	37.47	3	39.4	14	40.60	8	66.2	29
Oct. 7	43.40	−3	47.3	7	25.68	−1	57.7	27	37.44	−1	38.0	18	40.52	3	63.3	32
17	43.43	8	48.0	11	25.69	8	55.0	33	37.45	6	36.2	22	40.49	−4	60.1	37
27	18 43.51	13	49.1	12	18 25.77	12	51.7	31	21 37.51	11	34.0	22	21 40.53	11	56.4	35
Nov. 6	43.64	17	50.3	15	25.89	17	48.6	31	37.62	15	31.8	23	40.64	17	52.9	35
16	43.81	22	51.8	16	26.06	23	45.5	31	37.77	21	29.5	25	40.81	23	49.4	34
26	44.03	25	53.4	19	26.29	28	42.4	31	37.98	24	27.0	26	41.04	29	46.0	33
Dec. 6	44.28	29	55.3	20	26.57	31	39.3	28	38.22	28	24.4	25	41.33	34	42.7	30
16	44.57	31	57.3	20	26.88	34	36.5	26	38.50	30	21.9	24	41.67	39	39.7	27
26	44.88	31	59.3	21	27.22	37	33.9	21	38.80	32	19.5	22	42.06	41	37.0	22
36	45.19		61.4		27.59		31.8		39.12		17.3		42.47		34.8	
Mittl. Ort	41.89		41.6		25.22		63.5		36.32		42.2		40.85		68.1	
	179)				454)				180)				181)			

1902	89 Virginis. 5m.0				η Bootis. 3m.0				τ Virginis. 4m.0				11 Bootis. 6m.0			
	AR.		Decl. −		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	13h 44m		17° 38′		13h 50m		18° 52′		13h 56m		2° 0′		13h 56m		27° 51′	
Jan. 0	33.16s	34	43.1″	18	1.18s	32	71.9″	21	39.68s	32	63.7″	21	43.77s	34	24.7″	22
10	33.50	33	44.9	19	1.50	33	69.8	19	40.00	32	61.6	19	44.11	34	22.5	18
20	33.83	32	46.8	19	1.83	32	67.9	15	40.32	31	59.7	17	44.45	34	20.7	13
30	34.15	31	48.7	18	2.15	30	66.4	10	40.63	30	58.0	14	44.79	32	19.4	9
Febr. 9	34.46	28	50.5	18	2.45	28	65.4	7	40.93	27	56.6	12	45.11	29	18.5	4
19	34.74	24	52.3	17	2.73	25	64.7	2	41.20	25	55.4	9	45.40	26	18.1	— 1
März 1	34.98	21	54.0	15	2.98	21	64.5	— 2	41.45	21	54.5	6	45.66	23	18.2	6
11	35.19	18	55.5	13	3.19	18	64.7	6	41.66	18	53.9	3	45.89	19	18.8	10
21	35.37	14	56.8	11	3.37	14	65.3	9	41.84	14	53.6	0	46.08	15	19.8	14
31	35.51	11	57.9	9	3.51	10	66.2	12	41.98	12	53.6	2	46.23	11	21.2	17
April 10	35.62	8	58.8	8	3.61	7	67.4	14	42.10	8	53.8	5	46.34	7	22.9	18
20	35.70	5	59.6	5	3.68	4	68.8	15	42.18	5	54.3	6	46.41	4	24.7	20
30	35.75	2	60.1	4	3.72	0	70.3	16	42.23	3	54.9	8	46.45	0	26.7	21
Mai 10	35.77	— 1	60.5	2	3.72	2	71.9	16	42.26	0	55.7	8	46.45	2	28.8	20
20	35.76	3	60.7	1	3.70	4	73.5	16	42.26	3	56.5	9	46.43	6	30.8	19
30	35.73	5	60.8	— 1	3.66	7	75.1	15	42.23	5	57.4	9	46.37	8	32.7	17
Juni 9	35.68	8	60.7	2	3.59	9	76.6	13	42.18	6	58.3	9	46.29	10	34.4	16
19	35.60	9	60.5	3	3.50	11	77.9	11	42.12	9	59.2	8	46.19	12	36.0	13
29	35.51	11	60.2	5	3.39	12	79.0	9	42.03	10	60.0	8	46.07	14	37.3	10
Juli 9	35.40	13	59.7	5	3.27	13	79.9	7	41.93	12	60.8	7	45.93	15	38.3	7
19	35.27	13	59.2	7	3.14	14	80.6	4	41.81	13	61.5	6	45.78	16	39.0	4
29	35.14	14	58.5	8	3.00	15	81.0	2	41.68	13	62.1	5	45.62	17	39.4	0
Aug. 8	35.00	13	57.7	8	2.85	15	81.2	— 1	41.55	13	62.6	4	45.45	16	39.4	3
18	34.87	13	56.9	8	2.70	13	81.1	4	41.42	13	63.0	2	45.29	16	39.1	6
28	34.74	11	56.1	8	2.57	12	80.7	6	41.29	12	63.2	1	45.13	14	38.5	10
Sept. 7	34.63	9	55.3	8	2.45	11	80.1	10	41.17	9	63.3	— 1	44.99	12	37.5	13
17	34.54	6	54.5	7	2.34	7	79.1	12	41.08	7	63.2	4	44.87	9	36.2	17
27	34.48	3	53.8	5	2.27	4	77.9	15	41.01	4	62.8	6	44.78	6	34.5	19
Oct. 7	34.45	— 3	53.3	4	2.23	0	76.4	18	40.97	0	62.2	8	44.72	1	32.6	22
17	34.48	8	52.9	2	2.23	6	74.6	22	40.97	6	61.4	11	44.71	— 4	30.4	27
27	[22] 34.56	12	52.7	— 2	[23] 2.29	10	72.4	23	[25] 41.03	10	60.3	13	[25] 44.75	9	27.7	27
Nov. 6	34.68	17	52.9	4	2.39	15	70.1	24	41.13	14	59.0	15	44.84	14	25.0	28
16	34.85	22	53.3	7	2.54	19	67.7	25	41.27	19	57.5	18	44.98	19	22.2	29
26	35.07	26	54.0	10	2.73	24	65.2	26	41.46	24	55.7	19	45.17	24	19.3	29
Dec. 6	35.33	29	55.0	13	2.97	27	62.6	26	41.70	27	53.8	20	45.41	28	16.4	27
16	35.62	32	56.3	15	3.24	30	60.0	24	41.97	29	51.8	21	45.69	30	13.7	26
26	35.94	33	57.8	17	3.54	32	57.6	23	42.26	32	49.7	20	45.99	33	11.1	24
36	36.27		59.5		3.86		55.3		42.58		47.7		46.32		8.7	
Mittl. Ort	32.67		46.8		1.11		80.2		39.45		66.1		43.89		35.3	
	588)				182)				183)				457)			

1902	α Draconis. $3^m.3$. AR.		Decl. +		d Bootis. $5^m.0$. AR.		Decl. +		κ Virginis. $4^m.3$. AR.		Decl. −		4 Ursae min. $5^m.0$. AR.		Decl. +	
	$14^h\ 1^m$		64° 50′		$14^h\ 5^m$		25° 32′		$14^h\ 7^m$		9° 49′		$14^h\ 9^m$		77° 59′	
Jan. 0	42.41	57	20.8	19	55.65	33	70.6	23	40.29	33	2.1	19	8.61	103	70.5	17
10	42.98	59	18.9	13	55.98	34	68.3	18	40.62	32	4.0	18	9.64	110	68.8	12
20	43.57	60	17.6	6	56.32	33	66.5	14	40.94	32	5.8	17	10.74	112	67.6	4
30	44.17	57	17.0	0	56.65	32	65.1	10	41.26	30	7.5	17	11.86	110	67.2	— 2
Febr. 9	44.74	54	17.0	7	56.97	29	64.1	5	41.56	28	9.2	15	12.96	104	67.4	8
19	45.28	49	17.7	12	57.26	27	63.6	0	41.84	26	10.7	13	14.00	94	68.2	15
März 1	45.77	41	18.9	19	57.53	23	63.6	4	42.10	22	12.0	11	14.94	82	69.7	21
11	46.18	34	20.8	23	57.76	20	64.0	9	42.32	19	13.1	8	15.76	66	71.8	25
21	46.52	26	23.1	27	57.96	16	64.9	12	42.51	16	13.9	6	16.42	49	74.3	28
31	46.78	16	25.8	30	58.12	12	66.1	15	42.67	13	14.5	4	16.91	31	77.1	31
April 10	46.94	7	28.8	31	58.24	8	67.6	18	42.80	10	14.9	3	17.22	12	80.2	32
20	47.01	— 1	31.9	31	58.32	5	69.4	19	42.90	7	15.2	0	17.34	— 7	83.4	32
30	47.00	9	35.0	30	58.37	1	71.3	20	42.97	4	15.2	1	17.27	25	86.6	31
Mai 10	46.91	17	38.0	29	58.38	— 1	73.3	20	43.01	1	15.1	2	17.02	41	89.7	29
20	46.74	23	40.9	26	58.37	4	75.3	18	43.02	— 1	14.9	4	16.61	57	92.6	26
30	46.51	30	43.5	22	58.33	7	77.1	18	43.01	3	14.5	4	16.04	69	95.2	22
Juni 9	46.21	34	45.7	18	58.26	10	78.9	16	42.98	6	14.1	5	15.35	80	97.4	17
19	45.87	38	47.5	13	58.16	11	80.5	13	42.92	8	13.6	5	14.55	89	99.1	13
29	45.49	42	48.8	9	58.05	13	81.8	10	42.84	10	13.1	6	13.66	94	100.4	7
Juli 9	45.07	43	49.7	3	57.92	15	82.8	8	42.74	12	12.5	6	12.72	99	101.1	2
19	44.64	44	50.0	— 1	57.77	15	83.6	5	42.62	13	11.9	6	11.73	100	101.3	— 3
29	44.20	44	49.9	7	57.62	16	84.1	1	42.49	13	11.3	7	10.73	100	101.0	9
Aug. 8	43.76	43	49.2	12	57.46	16	84.2	— 2	42.36	14	10.6	6	9.73	97	100.1	14
18	43.33	40	48.0	17	57.30	16	84.0	5	42.22	13	10.0	5	8.76	91	98.7	19
28	42.93	37	46.3	22	57.14	15	83.5	8	42.09	12	9.5	5	7.85	84	96.8	23
Sept. 7	42.56	33	44.1	25	56.99	12	82.7	12	41.97	11	9.0	4	7.01	75	94.5	27
17	42.23	26	41.6	29	56.87	10	81.5	15	41.86	8	8.6	3	6.26	63	91.8	30
27	41.97	20	38.7	33	56.77	6	80.0	18	41.78	4	8.3	1	5.63	49	88.8	34
Oct. 7	41.77	12	35.4	35	56.71	2	78.2	21	41.74	1	8.2	— 1	5.14	35	85.4	36
17	41.65	3	31.9	40	56.69	— 2	76.1	23	41.73	— 4	8.3	3	4.79	18	81.8	38
27	[26] 41.62	— 7	27.9	38	56.71	9	73.8	28	41.77	11	8.6	6	4.61	— 1	78.0	42
Nov. 6	41.69	16	24.1	37	[27] 56.80	13	71.0	27	[28] 41.88	14	9.2	8	[28] 4.62	21	73.8	38
16	41.85	26	20.4	37	56.93	18	68.3	28	42.02	19	10.0	10	4.83	39	70.0	36
26	42.11	35	16.7	34	57.11	23	65.5	29	42.21	24	11.0	13	5.22	56	66.4	34
Dec. 6	42.46	43	13.3	32	57.34	26	62.6	27	42.45	26	12.3	15	5.78	73	63.0	30
16	42.89	50	10.1	27	57.60	30	59.9	26	42.71	30	13.8	17	6.51	88	60.0	26
26	43.39	55	7.4	22	57.90	33	57.3	24	43.01	32	15.5	18	7.39	100	57.4	21
36	43.94		5.2		58.23		54.9		43.33		17.3		8.39		55.3	
Mittl. Ort	44.12		38.9		55.79		80.1		40.00		4.0		13.26		89.1	
	184)				458)				185)				459)			

1902	ι Virginis. 4ᵐ.0. AR.	Δ	Decl. —	Δ	α Bootis. 1ᵐ. AR.	Δ	Decl. +	Δ	λ Bootis. 4ᵐ.0. AR.	Δ	Decl. +	Δ	ϑ Bootis. 3ᵐ.8. AR.	Δ	Decl. +	Δ
	14ʰ 10ᵐ		5° 31′		14ʰ 11ᵐ		19° 41′		14ʰ 12ᵐ		46° 31′		14ʰ 21ᵐ		52° 17′	
Jan. 0	52ˢ.62	33	58″.6	19	11ˢ.36	32	25″.8	22	38ˢ.77	39	62″.8	23	50ˢ.58	42	58″.2	23
10	52.95	32	60.5	19	11.68	33	23.6	20	39.16	40	60.5	17	51.00	43	55.9	18
20	53.27	31	62.4	17	12.01	32	21.6	16	39.56	40	58.8	11	51.43	44	54.1	12
30	53.58	30	64.1	16	12.33	30	20.0	12	39.96	39	57.7	6	51.87	43	52.9	5
Febr. 9	53.88	28	65.7	14	12.63	29	18.8	8	40.35	37	57.1	— 1	52.30	41	52.4	— 1
19	54.16	26	67.1	12	12.92	26	18.0	3	40.72	33	57.2	7	52.71	37	52.5	8
März 1	54.42	22	68.3	9	13.18	23	17.7	— 1	41.05	29	57.9	12	53.08	33	53.3	13
11	54.64	19	69.2	7	13.41	19	17.8	6	41.34	24	59.1	17	53.41	28	54.6	18
21	54.83	17	69.9	4	13.60	16	18.4	9	41.58	20	60.8	21	53.69	23	56.4	23
31	55.00	13	70.3	1	13.76	12	19.3	12	41.78	14	62.9	24	53.92	15	58.7	25
April 10	55.13	10	70.4	0	13.88	9	20.5	14	41.92	9	65.3	27	54.07	10	61.2	28
20	55.23	7	70.4	2	13.97	5	21.9	16	42.01	4	68.0	28	54.17	5	64.0	29
30	55.30	4	70.2	4	14.02	3	23.5	17	42.05	— 1	70.8	27	54.22	— 1	66.9	30
Mai 10	55.34	1	69.8	4	14.05	— 1	25.2	16	42.04	5	73.5	27	54.21	6	69.9	28
20	55.35	— 1	69.4	5	14.04	3	26.8	17	41.99	10	76.2	25	54.15	10	72.7	26
30	55.34	3	68.9	6	14.01	6	28.5	15	41.89	12	78.7	22	54.05	15	75.3	24
Juni 9	55.31	6	68.3	7	13.95	8	30.0	14	41.77	16	80.9	19	53.90	19	77.7	20
19	55.25	8	67.6	6	13.87	10	31.4	12	41.61	19	82.8	15	53.71	22	79.7	16
29	55.17	10	67.0	7	13.77	12	32.6	10	41.42	21	84.3	12	53.49	25	81.3	12
Juli 9	55.07	11	66.3	6	13.65	14	33.6	8	41.21	23	85.5	7	53.24	27	82.5	8
19	54.96	13	65.7	6	13.51	14	34.4	5	40.98	24	86.2	3	52.97	28	83.3	3
29	54.83	13	65.1	6	13.37	16	34.9	2	40.74	24	86.5	— 2	52.69	29	83.6	— 2
Aug. 8	54.70	14	64.5	5	13.21	16	35.1	0	40.50	24	86.3	6	52.40	29	83.4	7
18	54.56	14	64.0	4	13.05	15	35.1	4	40.26	24	85.7	11	52.11	28	82.7	12
28	54.42	12	63.6	4	12.90	14	34.7	6	40.02	21	84.6	15	51.83	26	81.5	16
Sept. 7	54.30	11	63.2	2	12.76	12	34.1	10	39.81	19	83.1	19	51.57	24	79.9	20
17	54.19	8	63.0	0	12.64	10	33.1	12	39.62	16	81.2	23	51.33	20	77.9	24
27	54.11	4	63.0	1	12.54	6	31.9	15	39.46	12	78.9	27	51.13	15	75.5	28
Oct. 7	54.07	1	63.1	4	12.48	2	30.4	19	39.34	6	76.2	29	50.98	9	72.7	31
17	54.06	— 4	63.5	6	12.46	— 2	28.5	21	39.28	— 1	73.3	32	50.89	— 4	69.6	34
27	54.10	9	64.1	9	12.48	8	26.4	25	39.27	7	70.1	37	50.85	4	66.2	39
Nov. 6	[28] 54.19	14	65.0	10	[28] 12.56	12	23.9	25	[29] 39.34	12	66.4	35	[31] 50.89	11	62.3	36
16	54.33	18	66.0	13	12.68	18	21.4	26	39.46	18	62.9	34	51.00	18	58.7	36
26	54.51	23	67.3	16	12.86	21	18.8	27	39.64	25	59.5	34	51.18	25	55.1	35
Dec. 6	54.74	27	68.9	17	13.07	26	16.1	27	39.89	30	56.1	32	51.43	31	51.6	32
16	55.01	29	70.6	18	13.33	29	13.4	26	40.19	34	52.9	28	51.74	36	48.4	30
26	55.30	31	72.4	19	13.62	31	10.8	23	40.53	38	50.1	25	52.10	39	45.4	26
36	55.61		74.3		13.93		8.5		40.91		47.6		52.49		42.8	
Mittl. Ort	52.39		59.2		11.43		33.3		39.48		77.1		51.61		72.9	
	186)				187)				188)				190)			

1902	ρ Bootis. 3ᵐ.6. AR.		Decl. +		γ Bootis. 2ᵐ.9. AR.		Decl. +		π Bootis pr. 4ᵐ.3. AR.		Decl. +		μ Virginis. 4ᵐ.0. AR.		Decl. —	
	$14^h\ 27^m$		30° 47′		$14^h\ 28^m$		38° 43′		$14^h\ 36^m$		16° 49′		$14^h\ 37^m$		5° 13′	
Jan. 0	36.03	33	55.5	24	7.34	35	60.5	23	7.00	31	71.1	23	53.71	31	55.0	18
10	36.36	34	53.1	19	7.69	36	58.2	20	7.31	32	68.8	20	54.02	32	56.8	18
20	36.70	34	51.2	15	8.05	37	56.2	14	7.63	32	66.8	16	54.34	32	58.6	17
30	37.04	33	49.7	10	8.42	36	54.8	9	7.95	31	65.2	13	54.66	31	60.3	15
Febr. 9	37.37	32	48.7	5	8.78	33	53.9	2	8.26	30	63.9	9	54.97	29	61.8	13
19	37.69	29	48.2	0	9.11	31	53.7	— 3	8.56	27	63.0	4	55.26	27	63.1	11
März 1	37.98	25	48.2	6	9.42	28	54.0	8	8.83	24	62.6	0	55.53	24	64.2	8
11	38.23	22	48.8	10	9.70	23	54.8	13	9.07	21	62.6	4	55.77	21	65.0	6
21	38.45	19	49.8	15	9.93	20	56.1	18	9.28	18	63.0	7	55.98	19	65.6	4
31	38.64	14	51.3	17	10.13	15	57.9	21	9.46	15	63.7	11	56.17	15	66.0	1
April 10	38.78	11	53.0	20	10.28	10	60.0	23	9.61	12	64.8	14	56.32	13	66.1	— 1
20	38.89	7	55.0	22	10.38	7	62.3	25	9.73	8	66.2	15	56.45	10	66.0	3
30	38.96	3	57.2	23	10.45	2	64.8	26	9.81	6	67.7	16	56.55	6	65.7	4
Mai 10	38.99	0	59.5	22	10.47	— 1	67.4	26	9.87	2	69.3	17	56.61	4	65.3	5
20	38.99	4	61.7	22	10.46	5	70.0	24	9.89	— 1	71.0	17	56.65	2	64.8	6
30	38.95	6	63.9	21	10.41	8	72.4	22	9.88	3	72.7	16	56.67	— 2	64.2	7
Juni 9	38.89	9	66.0	18	10.33	12	74.6	20	9.85	6	74.3	15	56.65	4	63.5	6
19	38.80	12	67.8	15	10.21	14	76.6	16	9.79	8	75.8	14	56.61	6	62.9	7
29	38.68	14	69.3	13	10.07	17	78.2	13	9.71	11	77.2	11	56.55	9	62.2	7
Juli 9	38.54	16	70.6	9	9.90	18	79.5	10	9.60	12	78.3	9	56.46	11	61.5	6
19	38.38	17	71.5	6	9.72	20	80.5	5	9.48	14	79.2	7	56.35	12	60.9	6
29	38.21	18	72.1	2	9.52	21	81.0	1	9.34	16	79.9	5	56.23	14	60.3	6
Aug. 8	38.03	18	72.3	— 1	9.31	21	81.1	— 3	9.18	16	80.4	2	56.09	14	59.7	5
18	37.85	18	72.2	5	9.10	21	80.8	7	9.02	15	80.6	— 1	55.95	15	59.2	4
28	37.67	17	71.7	9	8.89	20	80.1	11	8.87	15	80.5	4	55.80	14	58.8	3
Sept. 7	37.50	15	70.8	13	8.69	17	79.0	16	8.72	14	80.1	7	55.66	12	58.5	2
17	37.35	13	69.5	16	8.52	15	77.4	19	8.58	11	79.4	9	55.54	10	58.3	0
27	37.22	10	67.9	19	8.37	11	75.5	22	8.47	8	78.5	13	55.44	7	58.3	1
Oct. 7	37.12	5	66.0	22	8.26	7	73.3	26	8.39	5	77.2	15	55.37	4	58.4	3
17	37.07	0	63.8	25	8.19	1	70.7	29	8.34	0	75.7	18	55.33	— 1	58.7	6
27	37.07	5	61.3	31	8.18	— 4	67.8	34	8.34	6	73.9	23	55.34	7	59.3	9
Nov. 6	[2] 37.12	10	58.2	29	[2] 8.22	10	64.4	32	[4] 8.40	10	71.6	23	[4] 55.41	11	60.2	10
16	37.22	16	55.3	30	8.32	16	61.2	33	8.50	15	69.3	24	55.52	16	61.2	12
26	37.38	21	52.3	30	8.48	22	57.9	32	8.65	20	66.9	25	55.68	21	62.4	15
Dec. 6	37.59	26	49.3	30	8.70	26	54.7	32	8.85	24	64.4	26	55.89	24	63.9	16
16	37.85	29	46.3	28	8.96	31	51.5	29	9.09	27	61.8	25	56.13	28	65.5	18
26	38.14	31	43.5	25	9.27	33	48.6	26	9.36	29	59.3	23	56.41	30	67.3	19
36	38.45		41.0		9.60		46.0		9.65		57.0		56.71		69.2	
Mittl. Ort	36.39		65.2		7.90		72.1		7.17		76.4		53.63		56.3	
	192)				193)				194)				196)			

1902	109 Virginis. $3^m.6$.				α Librae. $2^m.3$.				Gr. 2164. $5^m.8$.				β Ursae min. $2^m.0$.			
	AR.		Decl. +		AR.		Decl. —		AR.		Decl. +		AR.		Decl. +	
	$14^h 41^m$		$2° 18'$		$14^h 45^m$		$15° 38'$		$14^h 48^m$		$59° 41'$		$14^h 50^m$		$74° 32'$	
Jan. 0	17.55	31	19.4	20	27.41	32	1.0	15	55.33	46	18.7	25	54.91	76	66.1	23
10	17.86	32	17.4	19	27.73	33	2.5	15	55.79	49	16.2	19	55.67	83	63.8	17
20	18.18	31	15.5	17	28.06	33	4.0	16	56.28	50	14.3	13	56.50	87	62.1	11
30	18.49	30	13.8	14	28.39	32	5.6	15	56.78	50	13.0	7	57.37	88	61.0	4
Febr. 9	18.79	29	12.4	12	28.71	30	7.1	15	57.28	49	12.3	0	58.25	86	60.6	2
19	19.08	27	11.2	9	29.01	28	8.6	13	57.77	46	12.3	6	59.11	82	60.8	9
März 1	19.35	24	10.3	5	29.29	26	9.9	12	58.23	41	12.9	13	59.93	74	61.7	16
11	19.59	21	9.8	2	29.55	22	11.1	10	58.64	36	14.2	19	60.67	64	63.3	21
21	19.80	19	9.6	0	29.77	20	12.1	9	59.00	30	16.1	23	61.31	52	65.4	25
31	19.99	16	9.6	3	29.97	17	13.0	6	59.30	24	18.4	27	61.83	39	67.9	29
April 10	20.15	12	9.9	6	30.14	14	13.6	5	59.54	16	21.1	29	62.22	25	70.8	31
20	20.27	9	10.5	8	30.28	11	14.1	3	59.70	8	24.0	31	62.47	10	73.9	32
30	20.36	7	11.3	9	30.39	9	14.4	2	59.78	2	27.1	31	62.57	4	77.1	32
Mai 10	20.43	4	12.2	9	30.48	5	14.6	0	59.80	5	30.2	31	62.53	17	80.3	32
20	20.47	1	13.1	10	30.53	2	14.6	0	59.75	11	33.3	29	62.36	30	83.5	29
30	20.48	2	14.1	11	30.55	0	14.6	2	59.64	17	36.2	26	62.06	42	86.4	26
Juni 9	20.46	4	15.2	10	30.55	4	14.4	2	59.47	22	38.8	24	61.64	52	89.0	23
19	20.42	7	16.2	9	30.51	6	14.2	3	59.25	27	41.2	19	61.12	61	91.3	18
29	20.35	9	17.1	9	30.45	8	13.9	4	58.98	31	43.1	15	60.51	68	93.1	14
Juli 9	20.26	10	18.0	8	30.37	11	13.5	4	58.67	35	44.6	11	59.83	73	94.5	9
19	20.16	13	18.8	6	30.26	13	13.1	5	58.32	36	45.7	5	59.10	78	95.4	3
29	20.03	14	19.4	6	30.13	14	12.6	5	57.96	38	46.2	0	58.32	80	95.7	2
Aug. 8	19.89	15	20.0	4	29.99	15	12.1	6	57.58	38	46.2	5	57.52	79	95.5	7
18	19.74	15	20.4	2	29.84	15	11.5	6	57.20	38	45.7	10	56.73	78	94.8	13
28	19.59	14	20.6	1	29.69	15	10.9	6	56.82	36	44.7	15	55.95	74	93.5	17
Sept. 7	19.45	13	20.7	1	29.54	13	10.3	6	56.46	34	43.2	19	55.21	69	91.8	22
17	19.32	10	20.6	3	29.41	11	9.7	5	56.12	29	41.3	23	54.52	62	89.6	26
27	19.22	8	20.3	5	29.30	8	9.2	4	55.83	25	39.0	28	53.90	52	87.0	30
Oct. 7	19.14	4	19.8	8	29.22	5	8.8	3	55.58	18	36.2	31	53.38	42	84.0	33
17	19.10	1	19.0	10	29.17	1	8.5	1	55.40	12	33.1	34	52.96	29	80.7	36
27	19.11	6	18.0	13	29.18	5	8.4	1	55.28	4	29.7	36	52.67	15	77.1	37
Nov. 6	[5] 19.17	10	16.7	15	29.23	12	8.5	4	55.24	6	26.1	40	52.52	1	73.4	42
16	19.27	15	15.2	17	[6] 29.35	16	8.9	7	[7] 55.30	14	22.1	38	[8] 52.53	16	69.2	37
26	19.42	20	13.5	18	29.51	21	9.6	8	55.44	23	18.3	36	52.69	32	65.5	37
Dec. 6	19.62	23	11.7	20	29.72	25	10.4	11	55.67	30	14.7	35	53.01	46	61.8	34
16	19.85	27	9.7	20	29.97	28	11.5	13	55.97	37	11.2	31	53.47	60	58.4	30
26	20.12	30	7.7	20	30.25	31	12.8	14	56.34	43	8.1	27	54.07	70	55.4	26
36	20.42		5.7		30.56		14.2		56.77		5.4		54.77		52.8	
Mittl. Ort	17.56		20.3		27.28		5.7		57.08		32.6		59.13		81.2	
	197)				590)				462)				198)			

1902	P. XIV, 221. 6ᵐ.0.				β Bootis. 3ᵐ.0.				γ Scorpii. 3ᵐ.4.				ψ Bootis. 4ᵐ.3.			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. −		AR.		Decl. +	
	14ʰ 51ᵐ		14° 50′		14ʰ 58ᵐ		40° 46′		14ʰ 58ᵐ		24° 53′		15ʰ 0ᵐ		27° 19′	
Jan. 0	35ˢ.48	31	28″.4	22	14ˢ.44	34	26″.9	26	20ˢ.02	33	41″.7	11	14ˢ.28	30	39″.4	25
10	35.79	31	26.2	20	14.78	36	24.3	22	20.35	35	42.8	13	14.58	33	36.9	21
20	36.10	31	24.2	17	15.14	36	22.1	16	20.70	34	44.1	14	14.91	33	34.8	17
30	36.41	31	22.5	14	15.50	37	20.5	11	21.04	34	45.5	14	15.24	32	33.1	13
Febr. 9	36.72	30	21.1	10	15.87	36	19.4	5	21.38	32	46.9	15	15.56	31	31.8	8
19	37.02	28	20.1	5	16.23	33	18.9	1	21.70	31	48.4	14	15.87	30	31.0	2
März 1	37.30	25	19.6	1	16.56	30	19.0	7	22.01	28	49.8	14	16.17	27	30.8	3
11	37.55	22	19.5	3	16.86	27	19.7	12	22.29	25	51.2	13	16.44	24	31.1	7
21	37.77	19	19.8	6	17.13	23	20.9	17	22.54	22	52.5	12	16.68	21	31.8	12
31	37.96	17	20.4	10	17.36	19	22.6	21	22.76	19	53.7	11	16.89	18	33.0	16
April 10	38.13	13	21.4	13	17.55	14	24.7	24	22.95	16	54.8	9	17.07	14	34.6	18
20	38.26	10	22.7	14	17.69	10	27.1	26	23.11	13	55.7	9	17.21	10	36.4	21
30	38.36	7	24.1	16	17.79	6	29.7	27	23.24	10	56.6	7	17.31	7	38.5	22
Mai 10	38.43	3	25.7	16	17.85	2	32.4	27	23.34	7	57.3	6	17.38	4	40.7	22
20	38.46	1	27.3	17	17.87	3	35.1	26	23.41	4	57.9	4	17.42	0	42.9	22
30	38.47	1	29.0	16	17.84	6	37.7	25	23.45	1	58.3	4	17.42	3	45.1	21
Juni 9	38.46	5	30.6	15	17.78	10	40.2	22	23.46	3	58.7	2	17.39	6	47.2	19
19	38.41	7	32.1	14	17.68	13	42.4	19	23.43	5	58.9	1	17.33	9	49.1	18
29	38.34	10	33.5	12	17.55	16	44.3	16	23.38	9	59.0	1	17.24	12	50.9	14
Juli 9	38.24	11	34.7	10	17.39	19	45.9	12	23.29	11	58.9	1	17.12	14	52.3	12
19	38.13	14	35.7	7	17.20	21	47.1	8	23.18	14	58.8	3	16.98	16	53.5	8
29	37.99	15	36.4	5	16.99	22	47.9	4	23.04	15	58.5	5	16.82	17	54.3	5
Aug. 8	37.84	16	36.9	3	16.77	23	48.3	0	22.89	16	58.0	6	16.65	19	54.8	2
18	37.68	16	37.2	0	16.54	23	48.3	5	22.73	17	57.4	6	16.46	19	55.0	2
28	37.52	16	37.2	2	16.31	23	47.8	10	22.56	16	56.8	8	16.27	18	54.8	5
Sept. 7	37.36	14	37.0	6	16.08	21	46.8	13	22.40	15	56.0	8	16.09	17	54.3	9
17	37.22	12	36.4	8	15.87	18	45.5	18	22.25	13	55.2	8	15.92	15	53.4	13
27	37.10	10	35.6	11	15.69	15	43.7	21	22.12	9	54.4	9	15.77	12	52.1	16
Oct. 7	37.00	5	34.5	14	15.54	11	41.6	25	22.03	6	53.5	7	15.65	8	50.5	20
17	36.95	2	33.1	16	15.43	6	39.1	28	21.97	1	52.8	6	15.57	4	48.5	22
27	36.93	3	31.5	19	15.37	1	36.3	30	21.96	5	52.2	5	15.53	1	46.3	25
Nov. 6	36.96	9	29.6	24	15.36	7	33.3	36	22.01	12	51.7	3	15.54	8	43.8	30
16	[8] 37.05	14	27.2	23	[9] 15.43	12	29.7	33	[9] 22.13	16	51.4	0	[10] 15.62	12	40.8	29
26	37.19	18	24.9	24	15.55	18	26.4	34	22.29	21	51.4	3	15.74	17	37.9	30
Dec. 6	37.37	23	22.5	25	15.73	23	23.0	33	22.50	25	51.7	5	15.91	22	34.9	29
16	37.60	26	20.0	24	15.96	28	19.7	31	22.75	29	52.2	8	16.13	26	32.0	28
26	37.86	29	17.6	23	16.24	32	16.6	28	23.04	32	53.0	10	16.39	30	29.2	26
36	38.15		15.3		16.56		13.8		23.36		54.0		16.69		26.6	
Mittl. Ort	35.70		32.5		15.26		36.8		19.90		49.4		14.75		46.2	
	463)				199)				591)				465)			

1902	δ Bootis. 3m.0.				β Librae. 2m.0.				1 H. Urs. min. 5m.3.				μ Bootis. 3m.8.			
	AR.		Decl. +		AR.		Decl. —		AR.		Decl. +		AR.		Decl. +	
	15h 11m		33° 40′		15h 11m		9° 1′		15h 13m		67° 42′		15h 20m		37° 42′	
Jan. 0	32.45	31	41.6	26	43.85	30	14.1	16	27.63	53	55.0	27	46.37	31	66.3	27
10	32.76	33	39.0	22	44.15	31	15.7	16	28.16	59	52.3	21	46.68	33	63.6	23
20	33.09	34	36.8	18	44.46	32	17.3	15	28.75	62	50.2	15	47.01	35	61.3	19
30	33.43	34	35.0	13	44.78	31	18.8	14	29.37	64	48.7	9	47.36	35	59.4	13
Febr. 9	33.77	33	33.7	7	45.09	30	20.2	13	30.01	64	47.8	1	47.71	35	58.1	7
19	34.10	32	33.0	2	45.39	29	21.5	11	30.65	61	47.7	— 5	48.06	33	57.4	1
März 1	34.42	29	32.8	— 4	45.68	26	22.6	9	31.26	56	48.2	12	48.39	31	57.3	— 4
11	34.71	26	33.2	9	45.94	24	23.5	6	31.82	50	49.4	18	48.70	28	57.7	10
21	34.97	23	34.1	14	46.18	22	24.1	4	32.32	43	51.2	22	48.98	24	58.7	15
31	35.20	19	35.5	18	46.40	19	24.5	3	32.75	34	53.4	26	49.22	20	60.2	19
April 10	35.39	15	37.3	21	46.59	16	24.8	0	33.09	25	56.0	29	49.42	17	62.1	22
20	35.54	12	39.4	23	46.75	13	24.8	1	33.34	15	58.9	32	49.59	13	64.3	25
30	35.66	8	41.7	24	46.88	10	24.7	3	33.49	6	62.1	32	49.72	8	66.8	26
Mai 10	35.74	4	44.1	25	46.98	8	24.4	4	33.55	— 4	65.3	33	49.80	5	69.4	27
20	35.78	0	46.6	25	47.06	4	24.0	5	33.51	13	68.6	31	49.85	1	72.1	27
30	35.78	3	49.1	24	47.10	2	23.5	5	33.38	22	71.7	28	49.86	— 3	74.8	25
Juni 9	35.75	6	51.5	22	47.12	— 2	23.0	6	33.16	30	74.5	25	49.83	7	77.3	23
19	35.69	10	53.7	19	47.10	4	22.4	5	32.86	36	77.0	22	49.76	10	79.6	21
29	35.59	13	55.6	16	47.06	7	21.9	6	32.50	42	79.2	17	49.66	14	81.7	18
Juli 9	35.46	15	57.2	13	46.99	10	21.3	6	32.08	48	80.9	13	49.52	17	83.5	14
19	35.31	18	58.5	10	46.89	12	20.7	5	31.60	51	82.2	7	49.35	19	84.9	11
29	35.13	19	59.5	6	46.77	13	20.2	6	31.09	53	82.9	3	49.16	21	86.0	6
Aug. 8	34.94	20	60.1	1	46.64	15	19.6	5	30.56	55	83.2	— 3	48.95	22	86.6	2
18	34.74	21	60.2	— 2	46.49	16	19.1	4	30.01	55	82.9	9	48.73	23	86.8	— 2
28	34.53	21	60.0	6	46.33	15	18.7	4	29.46	53	82.0	13	48.50	23	86.6	6
Sept. 7	34.32	20	59.4	11	46.18	15	18.3	3	28.93	50	80.7	18	48.27	22	86.0	11
17	34.12	17	58.3	14	46.03	12	18.0	2	28.43	46	78.9	23	48.05	19	84.9	15
27	33.95	14	56.9	18	45.91	10	17.8	1	27.97	40	76.6	27	47.86	16	83.4	19
Oct. 7	33.81	10	55.1	21	45.81	7	17.7	— 1	27.57	33	73.9	30	47.70	13	81.5	22
17	33.71	6	53.0	25	45.74	2	17.8	3	27.24	24	70.9	34	47.57	8	79.3	25
27	33.65	1	50.5	27	45.72	— 2	18.1	4	27.00	14	67.5	36	47.49	2	76.8	29
Nov. 6	33.64	— 5	47.8	33	45.74	9	18.5	8	26.86	4	63.9	41	47.47	— 3	73.9	34
16	[13] 33.69	11	44.5	31	[13] 45.83	13	19.3	9	[13] 26.82	— 9	59.8	38	[15] 47.50	9	70.5	32
26	33.80	16	41.4	32	45.96	18	20.2	12	26.91	19	56.0	37	47.59	15	67.3	33
Dec. 6	33.96	21	38.2	31	46.14	22	21.4	13	27.10	31	52.3	36	47.74	21	64.0	33
16	34.17	26	35.1	30	46.36	25	22.7	15	27.41	41	48.7	33	47.95	25	60.7	31
26	34.43	29	32.1	28	46.61	29	24.2	15	27.82	49	45.4	29	48.20	29	57.6	29
36	34.72		29.3		46.90		25.7		28.31		42.5		48.49		54.7	
Mittl. Ort	33.13		49.2		43.90		17.7		30.57		67.6		47.21		74.0	
			201)				200)				467)				202)	

1902	γ Ursae min. $3^m.0$ AR.	Δ	Decl. +	Δ	ι Draconis. $3^m.0$ AR.	Δ	Decl. +	Δ	β Coron. bor. $3^m.8$ AR.	Δ	Decl. +	Δ	ν¹ Bootis. $4^m.5$ AR.	Δ	Decl. +	Δ
	$15^h\ 20^m$		72° 10′		$15^h\ 22^m$		59° 18′		$15^h\ 23^m$		29° 26′		$15^h\ 27^m$		41° 9′	
Jan. 0	49.11	61	45.6	26	42.86	41	22.6	28	46.69	30	29.5	26	23.56	32	52.7	27
10	49.72	68	43.0	22	43.27	46	19.8	23	46.99	31	26.9	23	23.88	34	50.0	24
20	50.40	74	40.8	15	43.73	48	17.5	17	47.30	33	24.6	18	24.22	36	47.6	19
30	51.14	77	39.3	8	44.21	49	15.8	11	47.63	33	22.8	14	24.58	37	45.7	13
Febr. 9	51.91	77	38.5	2	44.70	50	14.7	4	47.96	33	21.4	9	24.95	36	44.4	8
19	52.68	74	38.3	— 5	45.20	47	14.3	— 3	48.29	30	20.5	3	25.31	34	43.6	1
März 1	53.42	70	38.8	11	45.67	44	14.6	9	48.59	29	20.2	— 2	25.65	32	43.5	— 5
11	54.12	62	39.9	18	46.11	40	15.5	15	48.88	26	20.4	7	25.97	30	44.0	11
21	54.74	53	41.7	22	46.51	34	17.0	21	49.14	23	21.1	12	26.27	26	45.1	15
31	55.27	43	43.9	27	46.85	29	19.1	25	49.37	20	22.3	16	26.53	22	46.6	20
April 10	55.70	31	46.6	30	47.14	21	21.6	28	49.57	16	23.9	19	26.75	18	48.6	23
20	56.01	19	49.6	32	47.35	15	24.4	30	49.73	13	25.8	22	26.93	13	50.9	26
30	56.20	6	52.8	33	47.50	9	27.4	32	49.86	10	28.0	23	27.06	10	53.5	27
Mai 10	56.26	— 5	56.1	32	47.59	1	30.6	32	49.96	6	30.3	24	27.16	5	56.2	28
20	56.21	17	59.3	31	47.60	— 6	33.8	30	50.02	2	32.7	24	27.21	0	59.0	28
30	56.04	28	62.4	29	47.54	11	36.8	29	50.04	— 1	35.1	23	27.21	3	61.8	27
Juni 9	55.76	37	65.3	26	47.43	18	39.7	27	50.03	5	37.4	21	27.18	7	64.5	24
19	55.39	46	67.9	22	47.25	23	42.4	23	49.98	8	39.5	19	27.11	11	66.9	22
29	54.93	54	70.1	18	47.02	28	44.7	19	49.90	11	41.4	17	27.00	15	69.1	19
Juli 9	54.39	61	71.9	13	46.74	32	46.6	14	49.79	13	43.1	14	26.85	18	71.0	15
19	53.78	65	73.2	8	46.42	35	48.0	10	49.66	17	44.5	10	26.67	20	72.5	10
29	53.13	69	74.0	3	46.07	38	49.0	5	49.49	18	45.5	7	26.47	22	73.5	7
Aug. 8	52.44	70	74.3	— 3	45.69	39	49.5	— 1	49.31	19	46.2	4	26.25	24	74.2	3
18	51.74	71	74.0	7	45.30	39	49.4	5	49.12	20	46.6	— 1	26.01	25	74.5	— 2
28	51.03	68	73.3	13	44.91	39	48.9	10	48.92	20	46.5	4	25.76	25	74.3	6
Sept. 7	50.35	65	72.0	18	44.52	37	47.9	16	48.72	19	46.1	8	25.51	23	73.7	11
17	49.70	60	70.2	22	44.15	34	46.3	20	48.53	17	45.3	12	25.28	21	72.6	16
27	49.10	53	68.0	27	43.81	30	44.3	24	48.36	15	44.1	16	25.07	18	71.0	19
Oct. 7	48.57	44	65.3	30	43.51	25	41.9	29	48.21	11	42.5	19	24.89	15	69.1	23
17	48.13	34	62.3	33	43.26	17	39.0	31	48.10	6	40.6	22	24.74	10	66.8	26
27	47.79	22	59.0	36	43.09	10	35.9	34	48.04	2	38.4	25	24.64	4	64.2	30
Nov. 6	47.57	9	55.4	41	42.99	2	32.5	40	48.02	— 4	35.9	28	24.60	— 1	61.2	32
16	[15] 47.48	— 5	51.3	38	[15] 42.97	— 7	28.5	37	48.06	10	33.1	32	24.61	9	58.0	36
26	47.53	20	47.5	36	43.04	16	24.8	37	[16] 48.16	14	29.9	30	[17] 24.70	14	54.4	34
Dec. 6	47.73	32	43.9	36	43.20	24	21.1	36	48.30	20	26.9	30	24.84	20	51.0	34
16	48.05	45	40.3	34	43.44	31	17.5	34	48.50	24	23.9	29	25.04	25	47.6	32
26	48.50	56	36.9	30	43.75	38	14.1	30	48.74	27	21.0	28	25.29	30	44.4	29
36	49.06		33.9		44.13		11.1		49.01		18.2		25.59		41.5	
Mittl. Ort	53.06		57.9		44.86		33.6		47.33		35.3		24.56		60.6	
	203)				204)				205)				206)			

1902	γ Librae. 4ᵐ.3. AR.		Decl. −		α Coron. bor. 2ᵐ.0. AR.		Decl. +		α Serpentis. 2ᵐ.3. AR.		Decl. +		β Serpentis. 3ᵐ.3. AR.		Decl. +	
	15ʰ 30ᵐ		14° 27′		15ʰ 30ᵐ		27° 2′		15ʰ 39ᵐ		6° 43′		15ʰ 41ᵐ		15° 43′	
Jan. 0	2.49ˢ	29	40.6″	13	31.69ˢ	29	34.5″	26	26.06ˢ	27	61.7″	21	39.33ˢ	28	40.5″	24
10	2.78	32	41.9	13	31.98	30	31.9	23	26.33	30	59.6	19	39.61	30	38.1	21
20	3.10	32	43.2	14	32.28	32	29.6	19	26.63	30	57.7	17	39.91	31	36.0	18
30	3.42	32	44.6	13	32.60	33	27.7	14	26.93	30	56.0	14	40.22	30	34.2	15
Febr. 9	3.74	31	45.9	12	32.93	32	26.3	10	27.23	30	54.6	11	40.52	31	32.7	11
19	4.05	30	47.1	11	33.25	31	25.3	4	27.53	29	53.5	8	40.83	29	31.6	6
März 1	4.35	28	48.2	10	33.56	29	24.9	— 1	27.82	28	52.7	5	41.12	27	31.0	3
11	4.63	25	49.2	8	33.85	26	25.0	6	28.10	25	52.2	0	41.39	26	30.7	— 2
21	4.88	23	50.0	6	34.11	23	25.6	11	28.35	22	52.2	3	41.65	23	30.9	7
31	5.11	21	50.6	4	34.34	20	26.7	15	28.57	21	52.5	6	41.88	21	31.6	10
April 10	5.32	18	51.0	2	34.54	17	28.2	18	28.78	17	53.1	8	42.09	17	32.6	13
20	5.50	15	51.2	1	34.71	14	30.0	20	28.95	15	53.9	11	42.26	15	33.9	15
30	5.65	13	51.3	0	34.85	10	32.0	22	29.10	12	55.0	12	42.41	12	35.4	17
Mai 10	5.78	10	51.3	1	34.95	7	34.2	23	29.22	9	56.2	14	42.53	9	37.1	18
20	5.88	6	51.2	2	35.02	3	36.5	23	29.31	6	57.6	14	42.62	5	38.9	18
30	5.94	4	51.0	2	35.05	0	38.8	23	29.37	3	59.0	14	42.67	2	40.7	19
Juni 9	5.98	0	50.8	3	35.05	4	41.1	21	29.40	0	60.4	14	42.69	— 1	42.6	18
19	5.98	3	50.5	4	35.01	6	43.2	19	29.40	3	61.8	13	42.68	4	44.4	16
29	5.95	6	50.1	3	34.95	10	45.1	17	29.37	7	63.1	11	42.64	7	46.0	14
Juli 9	5.89	9	49.8	4	34.85	13	46.8	14	29.30	9	64.2	10	42.57	10	47.4	13
19	5.80	12	49.4	5	34.72	15	48.2	11	29.21	11	65.2	9	42.47	12	48.7	10
29	5.68	14	48.9	4	34.57	17	49.3	7	29.10	14	66.1	7	42.35	15	49.7	8
Aug. 8	5.54	15	48.5	4	34.40	19	50.0	4	28.96	15	66.8	5	42.20	17	50.5	5
18	5.39	16	48.1	5	34.21	20	50.4	0	28.81	17	67.3	3	42.03	17	51.0	2
28	5.23	16	47.6	5	34.01	19	50.4	3	28.64	17	67.6	1	41.86	18	51.2	0
Sept. 7	5.07	16	47.1	4	33.82	19	50.1	7	28.47	16	67.7	— 1	41.68	17	51.2	3
17	4.91	14	46.7	4	33.63	17	49.4	11	28.31	14	67.6	3	41.51	16	50.9	7
27	4.77	11	46.3	3	33.46	14	48.3	14	28.17	13	67.3	6	41.35	14	50.2	9
Oct. 7	4.66	8	46.0	2	33.32	12	46.9	18	28.04	9	66.7	9	41.21	10	49.3	13
17	4.58	3	45.8	0	33.20	6	45.1	21	27.95	6	65.8	11	41.11	6	48.0	15
27	4.55	— 1	45.8	1	33.14	3	43.0	24	27.89	1	64.7	13	41.05	2	46.5	18
Nov. 6	4.56	6	45.9	3	33.11	— 3	40.6	26	27.88	— 4	63.4	15	41.03	— 3	44.7	20
16	4.62	12	46.2	6	33.14	9	38.0	31	27.92	10	61.9	20	41.06	9	42.7	25
26	^{17}4.74	17	46.8	8	^{17}33.23	14	34.9	29	^{19}28.02	14	59.9	19	^{20}41.15	13	40.2	24
Dec. 6	4.91	21	47.6	9	33.37	20	32.0	29	28.16	19	58.0	21	41.28	18	37.8	25
16	5.12	25	48.5	11	33.57	24	29.1	29	28.35	23	55.9	21	41.46	22	35.3	25
26	5.37	28	49.6	13	33.81	26	26.2	27	28.58	26	53.8	21	41.68	26	32.8	24
36	5.65		50.9		34.07		23.5		28.84		51.7		41.94		30.4	
Mittl. Ort	2.58		46.0		32.30		39.3		26.38		61.3		39.79		42.1	
	593)				209)				212)				213)			

1902	κ Serpentis. 4m.0. AR.		Decl. +		μ Serpentis. 3m.3. AR.		Decl. −		ε Serpentis. 3m.3. AR.		Decl. +		ζ Ursae min. 4m.3. AR.		Decl. +	
	15h 44m		18° 26′		15h 44m		3° 7′		15h 45m		4° 46′		15h 47m		78° 5′	
Jan. 0	19.19	27	36.4	24	29.99	28	46.4	17	55.43	27	21.7	19	25.98	75	36.0	28
10	19.46	29	34.0	22	30.27	29	48.1	17	55.70	29	19.8	19	26.73	90	33.2	23
20	19.75	31	31.8	18	30.56	31	49.8	15	55.99	30	17.9	17	27.63	100	30.9	18
30	20.06	31	30.0	15	30.87	30	51.3	14	56.29	30	16.2	14	28.63	108	29.1	11
Febr. 9	20.37	30	28.5	11	31.17	30	52.7	12	56.59	30	14.8	12	29.71	110	28.0	4
19	20.67	30	27.4	7	31.47	29	53.9	9	56.89	29	13.6	8	30.81	109	27.6	—2
März 1	20.97	28	26.7	1	31.76	28	54.8	6	57.18	28	12.8	4	31.90	105	27.8	9
11	21.25	26	26.6	—3	32.04	25	55.4	4	57.46	25	12.4	1	32.95	96	28.7	15
21	21.51	23	26.9	7	32.29	24	55.8	1	57.71	23	12.3	—2	33.91	84	30.2	20
31	21.74	21	27.6	11	32.53	21	55.9	—2	57.94	21	12.5	5	34.75	70	32.2	25
April 10	21.95	18	28.7	14	32.74	18	55.7	3	58.15	18	13.0	7	35.45	54	34.7	29
20	22.13	15	30.1	17	32.92	16	55.4	6	58.33	16	13.7	10	35.99	37	37.6	31
30	22.28	12	31.8	18	33.08	13	54.8	7	58.49	13	14.7	12	36.36	18	40.7	32
Mai 10	22.40	8	33.6	20	33.21	10	54.1	8	58.62	9	15.9	12	36.54	—1	43.9	33
20	22.48	6	35.6	20	33.31	7	53.3	9	58.71	7	17.1	13	36.53	18	47.2	32
30	22.54	2	37.6	19	33.38	4	52.4	9	58.78	4	18.4	14	36.35	36	50.4	31
Juni 9	22.56	—1	39.5	19	33.42	1	51.5	9	58.82	0	19.8	13	35.99	52	53.5	27
19	22.55	4	41.4	17	33.43	—2	50.6	9	58.82	2	21.1	12	35.47	67	56.2	24
29	22.51	8	43.1	15	33.41	5	49.7	8	58.80	6	22.3	11	34.80	79	58.6	20
Juli 9	22.43	10	44.6	14	33.36	8	48.9	7	58.74	9	23.4	10	34.01	90	60.6	16
19	22.33	13	46.0	11	33.28	11	48.2	7	58.65	11	24.4	9	33.11	99	62.2	11
29	22.20	15	47.1	8	33.17	14	47.5	6	58.54	13	25.3	7	32.12	105	63.3	6
Aug. 8	22.05	17	47.9	5	33.03	15	46.9	5	58.41	15	26.0	5	31.07	110	63.9	1
18	21.88	18	48.4	2	32.88	16	46.4	4	58.26	17	26.5	3	29.97	110	64.0	—5
28	21.70	18	48.6	0	32.72	16	46.0	3	58.09	17	26.8	2	28.87	110	63.5	9
Sept. 7	21.52	18	48.6	4	32.56	16	45.7	1	57.92	16	27.0	—1	27.77	106	62.6	15
17	21.34	16	48.2	8	32.40	15	45.6	0	57.76	15	26.9	2	26.71	100	61.1	19
27	21.18	14	47.4	10	32.25	12	45.6	2	57.61	13	26.7	5	25.71	91	59.2	24
Oct. 7	21.04	11	46.4	13	32.13	9	45.8	4	57.48	9	26.2	8	24.80	79	56.8	28
17	20.93	7	45.1	17	32.04	5	46.2	5	57.39	6	25.4	9	24.01	65	54.0	31
27	20.86	3	43.4	19	31.99	1	46.7	8	57.33	1	24.5	12	23.36	49	50.9	34
Nov. 6	20.83	—2	41.5	22	31.98	—4	47.5	9	57.32	—3	23.3	15	22.87	31	47.5	36
16	20.85	9	39.3	26	32.02	10	48.4	13	57.35	9	21.8	18	22.56	12	43.9	40
26	[21] 20.94	13	36.7	26	[21] 32.12	14	49.7	14	[21] 57.44	14	20.0	18	[21] 22.44	—10	39.9	37
Dec. 6	21.07	18	34.1	26	32.26	19	51.1	16	57.58	18	18.2	19	22.54	31	36.2	36
16	21.25	22	31.5	26	32.45	23	52.7	16	57.76	22	16.3	21	22.85	50	32.6	34
26	21.47	25	28.9	24	32.68	25	54.3	17	57.98	26	14.2	20	23.35	68	29.2	31
36	21.72		26.5		32.93		56.0		58.24		12.2		24.03		26.1	
Mittl. Ort	19.69		38.6		30.24		49.5		55.75		20.6		32.69		46.0	
	215)				214)				216)				217)			

1902	ε Coron. bor. 4m.0. AR.		Decl. +		δ Scorpii. 2m.3. AR.		Decl. —		β Scorpii. 2m.0. AR.		Decl. —		ϑ Draconis. 3m.6. AR.		Decl. +	
	15h 53m		27° 9′		15h 54m		22° 20′		15h 59m		19° 32′		16h 0m		58° 49′	
Jan. 0	31.06	27	37.6	26	32.04	29	27.7	8	43.98	29	8.4	10	1.08	35	29.3	30
10	31.33	29	35.0	24	32.33	31	28.5	10	44.27	31	9.4	10	1.43	41	26.3	26
20	31.62	32	32.6	20	32.64	33	29.5	10	44.58	32	10.4	10	1.84	45	23.7	21
30	31.94	32	30.6	15	32.97	34	30.5	11	44.90	32	11.4	11	2.29	47	21.6	16
Febr. 9	32.26	31	29.1	11	33.31	32	31.6	10	45.22	32	12.5	11	2.76	48	20.0	8
19	32.57	31	28.0	6	33.63	32	32.6	10	45.54	31	13.6	9	3.24	48	19.2	2
März 1	32.88	30	27.4	— 1	33.95	30	33.6	10	45.85	30	14.5	9	3.72	46	19.0	— 5
11	33.18	27	27.5	5	34.25	29	34.6	9	46.15	28	15.4	8	4.18	42	19.5	11
21	33.45	25	28.0	9	34.54	26	35.5	8	46.43	26	16.2	6	4.60	38	20.6	18
31	33.70	22	28.9	14	34.80	24	36.3	6	46.69	24	16.8	5	4.98	33	22.4	22
April 10	33.92	19	30.3	17	35.04	21	36.9	5	46.93	21	17.3	4	5.31	28	24.6	26
20	34.11	16	32.0	21	35.25	18	37.4	5	47.14	19	17.7	3	5.59	22	27.2	30
30	34.27	13	34.1	23	35.43	16	37.9	4	47.33	16	18.0	2	5.81	14	30.2	31
Mai 10	34.40	9	36.4	23	35.59	12	38.3	3	47.49	13	18.2	1	5.95	8	33.3	33
20	34.49	6	38.7	24	35.71	10	38.6	2	47.62	9	18.3	1	6.03	1	36.6	32
30	34.55	2	41.1	24	35.81	6	38.8	2	47.71	7	18.4	0	6.04	— 6	39.8	31
Juni 9	34.57	— 2	43.5	22	35.87	3	39.0	1	47.78	3	18.4	1	5.98	12	42.9	30
19	34.55	5	45.7	21	35.90	— 1	39.1	1	47.81	— 1	18.3	1	5.86	18	45.9	26
29	34.50	9	47.8	18	35.89	5	39.2	— 1	47.80	4	18.2	1	5.68	24	48.5	23
Juli 9	34.41	12	49.6	15	35.84	8	39.1	1	47.76	7	18.1	2	5.44	29	50.8	20
19	34.29	14	51.1	13	35.76	11	39.0	1	47.69	11	17.9	2	5.15	33	52.8	14
29	34.15	17	52.4	9	35.65	14	38.9	2	47.58	13	17.7	3	4.82	36	54.2	10
Aug. 8	33.98	19	53.3	6	35.51	16	38.7	4	47.45	16	17.4	3	4.46	39	55.2	5
18	33.79	20	53.9	2	35.35	17	38.3	4	47.29	17	17.1	4	4.07	40	55.7	0
28	33.59	20	54.1	— 1	35.18	18	37.9	4	47.12	17	16.7	4	3.67	41	55.7	6
Sept. 7	33.39	20	54.0	6	35.00	17	37.5	6	46.95	17	16.3	5	3.26	40	55.1	10
17	33.19	19	53.4	9	34.83	16	36.9	5	46.78	16	15.8	4	2.86	38	54.1	16
27	33.00	16	52.5	13	34.67	14	36.4	6	46.62	14	15.4	4	2.48	34	52.5	20
Oct. 7	32.84	13	51.2	16	34.53	10	35.8	5	46.48	10	15.0	4	2.14	30	50.5	24
17	32.71	9	49.6	20	34.43	6	35.3	5	46.38	7	14.6	3	1.84	23	48.1	28
27	32.62	5	47.6	23	34.37	1	34.8	3	46.31	1	14.3	2	1.61	17	45.3	32
Nov. 6	32.57	— 1	45.3	25	34.36	— 4	34.5	2	46.30	— 3	14.1	1	1.44	10	42.1	34
16	32.58	7	42.8	31	34.40	11	34.3	0	46.33	10	14.0	— 1	1.34	1	38.7	40
26	23 32.65	11	39.7	29	23 34.51	15	34.3	1	24 46.43	14	14.1	4	24 1.33	— 9	34.7	37
Dec. 6	32.76	16	36.8	29	34.66	20	34.4	4	46.57	18	14.5	5	1.42	17	31.0	37
16	32.92	21	33.9	29	34.86	24	34.8	6	46.75	24	15.0	7	1.59	25	27.3	35
26	33.13	25	31.0	28	35.10	28	35.4	7	46.99	27	15.7	9	1.84	31	23.8	32
36	33.38		28.2		35.38		36.1		47.26		16.6		2.15		20.6	
Mittl. Ort	31.76		41.0		32.21		35.4		44.19		15.6		3.26		36.9	
	219)				594)				595)				220)			

1902	δ Ophiuchi. $3^m.0$ AR.		Decl. —		ε Ophiuchi. $3^m.3$ AR.		Decl. —		19 Ursae min. $5^m.8$ AR.		Decl. +		τ Herculis. $3^m.3$ AR.		Decl. +	
	$16^h\ 9^m$		3° 26′		$16^h\ 13^m$		4° 27′		$16^h\ 13^m$		76° 7′		$16^h\ 16^m$		46° 32′	
Jan. 0	12.16	26	28.2	16	7.72	26	10.4	15	30.56	58	20.2	30	46.11	28	42.7	31
10	12.42	28	29.8	15	7.98	28	11.9	15	31.14	72	17.2	26	46.39	32	39.6	27
20	12.70	29	31.3	15	8.26	30	13.4	14	31.86	82	14.6	21	46.71	36	36.9	23
30	12.99	31	32.8	13	8.56	30	14.8	13	32.68	90	12.5	15	47.07	37	34.6	17
Febr. 9	13.30	30	34.1	11	8.86	30	16.1	11	33.58	95	11.0	8	47.44	37	32.9	11
19	13.60	29	35.2	9	9.16	30	17.2	9	34.53	96	10.2	2	47.81	38	31.8	5
März 1	13.89	28	36.1	6	9.46	28	18.1	6	35.49	93	10.0	— 5	48.19	37	31.3	— 1
11	14.17	27	36.7	3	9.74	27	18.7	3	36.42	88	10.5	12	48.56	35	31.4	8
21	14.44	25	37.0	1	10.01	25	19.0	1	37.30	79	11.7	18	48.91	32	32.2	13
31	14.69	23	37.1	— 2	10.26	23	19.1	— 1	38.09	68	13.5	22	49.23	28	33.5	19
April 10	14.92	20	36.9	4	10.49	21	19.0	4	38.77	56	15.7	27	49.51	25	35.4	23
20	15.12	18	36.5	6	10.70	19	18.6	6	39.33	42	18.4	30	49.76	20	37.7	26
30	15.30	16	35.9	8	10.89	15	18.0	7	39.75	26	21.4	32	49.96	15	40.3	29
Mai 10	15.46	12	35.1	8	11.04	13	17.3	8	40.01	10	24.6	33	50.11	11	43.2	30
20	15.58	10	34.3	9	11.17	10	16.5	9	40.11	— 5	27.9	33	50.22	6	46.2	31
30	15.68	6	33.4	10	11.27	7	15.6	9	40.06	20	31.2	32	50.28	2	49.3	30
Juni 9	15.74	3	32.4	9	11.34	4	14.7	9	39.86	35	34.4	30	50.30	— 4	52.3	28
19	15.77	0	31.5	9	11.38	0	13.8	9	39.51	48	37.4	27	50.26	9	55.1	27
29	15.77	4	30.6	9	11.38	3	12.9	8	39.03	61	40.1	24	50.17	13	57.8	24
Juli 9	15.73	7	29.7	8	11.35	7	12.1	7	38.42	71	42.5	19	50.04	17	60.2	20
19	15.66	10	28.9	7	11.28	10	11.4	7	37.71	80	44.4	15	49.87	22	62.2	17
29	15.56	12	28.2	6	11.18	12	10.7	6	36.91	88	45.9	10	49.65	24	63.9	12
Aug. 8	15.44	15	27.6	5	11.06	15	10.1	5	36.03	93	46.9	5	49.41	27	65.1	8
18	15.29	16	27.1	3	10.91	16	9.6	4	35.10	95	47.4	0	49.14	28	65.9	3
28	15.13	17	26.8	3	10.75	17	9.2	3	34.15	96	47.4	6	48.86	30	66.2	— 2
Sept. 7	14.96	17	26.5	2	10.58	17	8.9	2	33.19	95	46.8	10	48.56	29	66.0	7
17	14.79	16	26.3	0	10.41	16	8.7	0	32.24	91	45.8	16	48.27	28	65.3	11
27	14.63	14	26.3	2	10.25	14	8.7	1	31.33	84	44.2	20	47.99	26	64.2	16
Oct. 7	14.49	11	26.5	3	10.11	11	8.8	3	30.49	75	42.2	25	47.73	22	62.6	20
17	14.38	7	26.8	5	10.00	8	9.1	4	29.74	65	39.7	28	47.51	17	60.6	25
27	14.31	3	27.3	7	9.92	3	9.5	7	29.09	52	36.9	32	47.34	13	58.1	28
Nov. 6	14.28	— 1	28.0	9	9.89	— 1	10.2	8	28.57	36	33.7	34	47.21	6	55.3	31
16	14.29	7	28.9	11	9.90	6	11.0	10	28.21	19	30.3	36	47.15	0	52.2	33
26	14.36	13	30.0	15	9.96	13	12.0	14	28.02	2	26.7	41	47.15	7	48.9	38
Dec. 6	[27] 14.49	16	31.5	14	[27] 10.09	17	13.4	14	[27] 28.00	— 17	22.6	37	[28] 47.22	13	45.1	36
16	14.65	21	32.9	15	10.26	20	14.8	14	28.17	35	18.9	35	47.35	20	41.5	34
26	14.86	24	34.4	16	10.46	24	16.2	16	28.52	53	15.4	32	47.55	26	38.1	32
36	15.10		36.0		10.70		17.8		29.05		12.2		47.81		34.9	
Mittl. Ort	12.49		32.0		8.07		14.5		36.49		27.5		47.54		47.5	
	222)				223)				472)				224)			

1902	γ Herculis. $3^m.1$ AR.	Δ	Decl. +	Δ	η Draconis. $2^m.6$ AR.	Δ	Decl. +	Δ	α Scorpii. $1^m.3$ AR.	Δ	Decl. −	Δ	β Herculis. $2^m.3$ AR.	Δ	Decl. +	Δ
	$16^h\ 17^m$		$19°\ 22'$		$16^h\ 22^m$		$61°\ 43'$		$16^h\ 23^m$		$26°\ 12'$		$16^h\ 25^m$		$21°\ 41'$	
Jan. 0	35.11	25	58.5	25	37.52	34	63.2	32	23.49	28	45.4	4	59.63	24	70.0	26
10	35.36	27	56.0	22	37.86	40	60.0	28	23.77	31	45.8	6	59.87	27	67.4	23
20	35.63	29	53.8	20	38.26	45	57.2	23	24.08	33	46.4	7	60.14	29	65.1	21
30	35.92	30	51.8	16	38.71	49	54.9	18	24.41	33	47.1	8	60.43	30	63.0	16
Febr. 9	36.22	31	50.2	12	39.20	52	53.1	11	24.74	34	47.9	8	60.73	31	61.4	12
19	36.53	30	49.0	8	39.72	52	52.0	4	25.08	33	48.7	8	61.04	30	60.2	8
März 1	36.83	29	48.2	2	40.24	50	51.6	3	25.41	32	49.5	8	61.34	30	59.4	3
11	37.12	27	48.0	2	40.74	48	51.9	9	25.73	31	50.3	7	61.64	28	59.1	2
21	37.39	26	48.2	7	41.22	44	52.8	15	26.04	29	51.0	7	61.92	26	59.3	7
31	37.65	23	48.9	10	41.66	39	54.3	21	26.33	26	51.7	7	62.18	24	60.0	11
April 10	37.88	21	49.9	14	42.05	33	56.4	25	26.59	25	52.4	5	62.42	21	61.1	15
20	38.09	18	51.3	17	42.38	26	58.9	29	26.84	22	52.9	5	62.63	19	62.6	18
30	38.27	15	53.0	19	42.64	20	61.8	31	27.06	19	53.4	5	62.82	16	64.4	20
Mai 10	38.42	12	54.9	21	42.84	12	64.9	33	27.25	16	53.9	4	62.98	12	66.4	22
20	38.54	9	57.0	22	42.96	4	68.2	33	27.41	13	54.3	4	63.10	10	68.6	23
30	38.63	5	59.2	21	43.00	3	71.5	33	27.54	9	54.7	3	63.20	6	70.9	22
Juni 9	38.68	2	61.3	20	42.97	10	74.8	31	27.63	5	55.0	3	63.26	2	73.1	22
19	38.70	2	63.3	19	42.87	17	77.9	28	27.68	2	55.3	3	63.28	2	75.3	21
29	38.68	6	65.2	18	42.70	24	80.7	25	27.70	2	55.6	2	63.26	5	77.4	18
Juli 9	38.62	9	67.0	15	42.46	30	83.2	22	27.68	7	55.8	1	63.21	9	79.2	17
19	38.53	12	68.5	13	42.16	35	85.4	17	27.61	10	55.9	1	63.12	11	80.9	14
29	38.41	14	69.8	11	41.81	39	87.1	13	27.51	13	56.0	1	63.01	15	82.3	11
Aug. 8	38.27	17	70.9	7	41.42	43	88.4	7	27.38	15	55.9	1	62.86	17	83.4	8
18	38.10	18	71.6	5	40.99	45	89.1	3	27.23	18	55.8	2	62.69	19	84.2	5
28	37.92	19	72.1	1	40.54	46	89.4	3	27.05	19	55.6	4	62.50	20	84.7	1
Sept. 7	37.73	19	72.2	3	40.08	46	89.1	8	26.86	19	55.2	5	62.30	19	84.8	2
17	37.54	18	71.9	5	39.62	44	88.3	12	26.67	18	54.7	5	62.11	19	84.6	5
27	37.36	17	71.4	9	39.18	41	87.1	18	26.49	16	54.2	5	61.92	17	84.1	10
Oct. 7	37.19	13	70.5	12	38.77	36	85.3	23	26.33	13	53.7	6	61.75	15	83.1	12
17	37.06	10	69.3	15	38.41	30	83.0	26	26.20	9	53.1	7	61.60	12	81.9	16
27	36.96	6	67.8	18	38.11	24	80.4	30	26.11	4	52.4	5	61.48	7	80.3	19
Nov. 6	36.90	2	66.0	21	37.87	15	77.4	33	26.07	1	51.9	5	61.41	2	78.4	21
16	36.88	4	63.9	24	37.72	7	74.1	36	26.08	7	51.4	3	61.39	3	76.3	24
26	36.92	10	61.5	27	37.65	4	70.5	41	26.15	13	51.1	2	61.42	9	73.9	29
Dec. 6	(28) 37.02	15	58.8	26	(30) 37.69	12	66.4	37	(30) 26.28	18	50.9	0	(30) 61.51	13	71.0	27
16	37.17	19	56.2	26	37.81	21	62.7	36	26.46	22	50.9	2	61.64	18	68.3	27
26	37.36	22	53.6	26	38.02	30	59.1	32	26.68	27	51.1	4	61.82	22	65.6	26
36	37.58		51.0		38.32		55.9		26.95		51.5		62.04		63.0	
Mittl. Ort	35.75		58.9		40.11		68.9		23.79		54.0		60.34		70.3	
	225)				226)				596)				228)			

1902	*A* Draconis. 5ᵐ.0. AR.		Decl. +		σ Herculis. 4ᵐ.1. AR.		Decl. +		ζ Ophiuchi. 2ᵐ.6. AR.		Decl. —		η Herculis. 3ᵐ.1. AR.		Decl. +	
	16ʰ 28ᵐ		68° 58′		16ʰ 30ᵐ		42° 38′		16ʰ 31ᵐ		10° 22′		16ʰ 39ᵐ		39° 6′	
Jan. 0	6.41	39	43.2	32	55.29	26	16.5	31	45.28	26	2.2	12	30.99	24	28.8	31
10	6.80	49	40.0	29	55.55	29	13.4	27	45.54	27	3.4	12	31.23	28	25.7	27
20	7.29	56	37.1	23	55.84	33	10.7	23	45.81	29	4.6	11	31.51	31	23.0	24
30	7.85	61	34.8	17	56.17	34	8.4	19	46.10	30	5.7	11	31.82	33	20.6	19
Febr. 9	8.46	65	33.1	11	56.51	36	6.5	13	46.40	31	6.8	10	32.15	34	18.7	14
19	9.11	66	32.0	4	56.87	36	5.2	7	46.71	30	7.8	8	32.49	34	17.3	7
März 1	9.77	65	31.6	—2	57.23	35	4.5	0	47.01	30	8.6	6	32.83	34	16.6	2
11	10.42	61	31.8	10	57.58	34	4.5	6	47.31	28	9.2	4	33.17	32	16.4	—5
21	11.03	57	32.8	15	57.92	31	5.1	11	47.59	26	9.6	2	33.49	31	16.9	10
31	11.60	51	34.3	21	58.23	28	6.2	17	47.85	25	9.8	0	33.80	28	17.9	15
April 10	12.11	42	36.4	26	58.51	25	7.9	21	48.10	23	9.8	2	34.08	25	19.4	20
20	12.53	34	39.0	29	58.76	21	10.0	25	48.33	20	9.6	3	34.33	21	21.4	24
30	12.87	24	41.9	31	58.97	17	12.5	28	48.53	18	9.3	4	34.54	18	23.8	26
Mai 10	13.11	14	45.0	33	59.14	13	15.3	29	48.71	15	8.9	6	34.72	14	26.4	28
20	13.25	3	48.3	34	59.27	8	18.2	30	48.86	12	8.3	6	34.86	9	29.2	29
30	13.28	—6	51.7	33	59.35	4	21.2	30	48.98	9	7.7	6	34.95	5	32.1	29
Juni 9	13.22	16	55.0	31	59.39	—1	24.2	28	49.07	5	7.1	6	35.00	1	35.0	29
19	13.06	26	58.1	29	59.38	6	27.0	27	49.12	2	6.5	6	35.01	—4	37.9	26
29	12.80	34	61.0	25	59.32	10	29.7	24	49.14	—2	5.9	6	34.97	8	40.5	24
Juli 9	12.46	42	63.5	22	59.22	14	32.1	21	49.12	5	5.3	5	34.89	12	42.9	22
19	12.04	49	65.7	18	59.08	19	34.2	18	49.07	8	4.8	5	34.77	16	45.1	18
29	11.55	55	67.5	13	58.89	21	36.0	14	48.99	12	4.3	5	34.61	19	46.9	14
Aug. 8	11.00	59	68.8	8	58.68	24	37.4	9	48.87	14	3.8	4	34.42	22	48.3	10
18	10.41	61	69.6	2	58.44	26	38.3	5	48.73	16	3.4	3	34.20	25	49.3	6
28	9.80	63	69.8	—2	58.18	27	38.8	0	48.57	17	3.1	3	33.95	25	49.9	1
Sept. 7	9.17	63	69.6	8	57.91	28	38.8	4	48.40	18	2.8	2	33.70	26	50.0	—3
17	8.54	60	68.8	13	57.63	26	38.4	9	48.22	17	2.6	2	33.44	25	49.7	7
27	7.94	57	67.5	17	57.37	25	37.5	14	48.05	15	2.4	1	33.19	23	49.0	12
Oct. 7	7.37	51	65.8	23	57.12	21	36.1	18	47.90	12	2.3	0	32.96	21	47.8	17
17	6.86	44	63.5	27	56.91	17	34.3	22	47.78	9	2.3	2	32.75	17	46.1	21
27	6.42	35	60.8	30	56.74	13	32.1	26	47.69	5	2.5	3	32.58	12	44.0	24
Nov. 6	6.07	25	57.8	33	56.61	8	29.5	29	47.64	0	2.8	4	32.46	7	41.6	27
16	5.82	14	54.5	36	56.53	1	26.6	32	47.64	5	3.2	7	32.39	1	38.9	31
26	5.68	2	50.9	41	56.52	—6	23.4	37	47.69	11	3.9	9	32.38	—5	35.8	35
Dec. 6	[1] 5.66	—11	46.8	37	[2] 56.58	12	19.7	34	[2] 47.80	15	4.8	9	32.43	11	32.3	33
16	5.77	23	43.1	36	56.70	18	16.3	34	47.95	19	5.7	11	32.54	16	29.0	33
26	6.00	35	39.5	34	56.88	23	12.9	32	48.14	23	6.8	12	32.70	22	25.7	32
36	6.35		36.1		57.11		9.7		48.37		8.0		32.92		22.5	
Mittl. Ort	10.16		48.7		56.59		19.6		45.65		7.9		32.18		30.7	
			229)				230)				597)				232)	

1902	Gr. 2377. $5^m.0$. AR.		Decl. +		49 Herculis. $6^m.0$. AR.		Decl. +		κ Ophiuchi. $3^m.3$. AR.		Decl. +		ε Herculis. $3^m.3$. AR.		Decl. +	
	$16^h\ 43^m$		$56°\ 57'$		$16^h\ 47^m$		$15°\ 8'$		$16^h\ 53^m$		$9°\ 31'$		$16^h\ 56^m$		$31°\ 4'$	
Jan. 0	^{s}24.19	28	$''$21.1	33	^{s}36.47	22	$''$20.0	23	^{s}1.11	22	$''$41.2	21	^{s}31.39	22	$''$13.9	28
10	24.47	34	17.8	30	36.69	25	17.7	22	1.33	24	39.1	20	31.61	25	11.1	27
20	24.81	38	14.8	25	36.94	28	15.5	19	1.57	27	37.1	17	31.86	28	8.4	24
30	25.19	43	12.3	20	37.22	29	13.6	16	1.84	28	35.4	15	32.14	30	6.0	19
Febr. 9	25.62	44	10.3	13	37.51	29	12.0	13	2.12	29	33.9	12	32.44	31	4.1	14
19	26.06	46	9.0	8	37.80	30	10.7	8	2.41	30	32.7	9	32.75	32	2.7	9
März 1	26.52	45	8.2	0	38.10	29	9.9	4	2.71	28	31.8	4	33.07	32	1.8	3
11	26.97	44	8.2	7	38.39	28	9.5	0	2.99	28	31.4	1	33.39	30	1.5	— 2
21	27.41	40	8.9	12	38.67	26	9.5	5	3.27	27	31.3	— 4	33.69	29	1.7	7
31	27.81	37	10.1	18	38.93	25	10.0	9	3.54	25	31.7	7	33.98	28	2.4	13
April 10	28.18	33	11.9	23	39.18	23	10.9	12	3.79	23	32.4	10	34.26	24	3.7	17
20	28.51	27	14.2	28	39.41	20	12.1	15	4.02	21	33.4	13	34.50	22	5.4	21
30	28.78	21	17.0	30	39.61	18	13.6	18	4.23	18	34.7	15	34.72	19	7.5	23
Mai 10	28.99	16	20.0	32	39.79	15	15.4	19	4.41	16	36.2	17	34.91	16	9.8	26
20	29.15	8	23.2	33	39.94	12	17.3	20	4.57	12	37.9	17	35.07	12	12.4	27
30	29.23	3	26.5	33	40.06	8	19.3	20	4.69	9	39.6	17	35.19	8	15.1	27
Juni 9	29.26	— 4	29.8	31	40.14	5	21.3	19	4.78	6	41.3	18	35.27	3	17.8	26
19	29.22	11	32.9	30	40.19	1	23.2	19	4.84	2	43.1	16	35.30	0	20.4	26
29	29.11	17	35.9	27	40.20	— 2	25.1	18	4.86	— 1	44.7	16	35.30	4	23.0	23
Juli 9	28.94	22	38.6	24	40.18	6	26.9	16	4.85	5	46.3	14	35.26	9	25.3	21
19	28.72	27	41.0	19	40.12	9	28.5	13	4.80	9	47.7	12	35.17	12	27.4	18
29	28.45	32	42.9	16	40.03	13	29.8	11	4.71	12	48.9	10	35.05	16	29.2	15
Aug. 8	28.13	35	44.5	11	39.90	16	30.9	9	4.59	14	49.9	8	34.89	18	30.7	11
18	27.78	38	45.6	5	39.74	17	31.8	6	4.45	16	50.7	6	34.71	21	31.8	8
28	27.40	39	46.1	1	39.57	18	32.4	3	4.29	18	51.3	3	34.50	22	32.6	3
Sept. 7	27.01	40	46.2	— 4	39.39	19	32.7	0	4.11	19	51.6	0	34.28	23	32.9	— 1
17	26.61	39	45.8	10	39.20	19	32.7	3	3.92	18	51.6	1	34.05	23	32.8	5
27	26.22	36	44.8	14	39.01	17	32.4	6	3.74	17	51.5	5	33.82	21	32.3	9
Oct. 7	25.86	33	43.4	19	38.84	15	31.8	9	3.57	15	51.0	7	33.61	19	31.4	13
17	25.53	29	41.5	24	38.69	12	30.9	13	3.42	11	50.3	10	33.42	16	30.1	17
27	25.24	22	39.1	28	38.57	8	29.6	15	3.31	8	49.3	12	33.26	12	28.4	20
Nov. 6	25.02	16	36.3	31	38.49	4	28.1	17	3.23	4	48.1	15	33.14	7	26.4	24
16	24.86	8	33.2	34	38.45	— 1	26.4	21	3.19	— 2	46.6	17	33.07	1	24.0	26
26	24.78	0	29.8	40	38.46	8	24.3	24	3.21	6	44.9	19	33.06	— 3	21.4	29
Dec. 6	[4] 24.78	9	25.8	36	[5] 38.54	11	21.9	23	3.27	12	43.0	22	33.09	10	18.5	33
16	24.87	17	22.2	36	38.65	16	19.6	24	[7] 3.39	16	40.8	21	[7] 33.19	15	15.2	30
26	25.04	24	18.6	35	38.81	21	17.2	24	3.55	20	38.7	22	33.34	19	12.2	30
36	25.28		15.1		39.02		14.8		3.75		36.5		33.53		9.2	
Mittl. Ort	26.37		24.4		37.12		18.1		1.70		38.2		32.37		13.6	
	477)				478)				233)				234)			

1902	η Ophiuchi. 2ᵐ.3. AR.		Decl. −		ζ Draconis. 3ᵐ.0. AR.		Decl. +		α Hercul. 3.2...4ᵐ.0. AR.		Decl. +		δ Herculis. 3ᵐ.0. AR.		Decl. +	
	17ʰ 4ᵐ		15° 36′		17ʰ 8ᵐ		65° 49′		17ʰ 10ᵐ		14° 29′		17ʰ 10ᵐ		24° 57′	
Jan. 0	44.90	23	7.0	8	26.83	27	65.9	34	10.00	20	69.0	23	59.47	20	18.2	27
10	45.13	26	7.8	8	27.10	36	62.5	31	10.20	23	66.7	21	59.67	24	15.5	25
20	45.39	28	8.6	8	27.46	45	59.4	27	10.43	26	64.6	19	59.91	26	13.0	22
30	45.67	30	9.4	8	27.91	50	56.7	22	10.69	28	62.7	17	60.17	28	10.8	19
Febr. 9	45.97	30	10.2	7	28.41	54	54.5	16	10.97	29	61.0	13	60.45	30	8.9	15
19	46.27	31	10.9	6	28.95	57	52.9	10	11.26	29	59.7	8	60.75	31	7.4	9
März 1	46.58	30	11.5	4	29.52	58	51.9	2	11.55	29	58.9	5	61.06	30	6.5	5
11	46.88	30	11.9	3	30.10	57	51.7	— 4	11.84	28	58.4	0	61.36	29	6.0	— 1
21	47.18	29	12.2	2	30.67	55	52.1	10	12.12	28	58.4	4	61.65	29	6.1	6
31	47.47	27	12.4	0	31.22	50	53.1	17	12.40	26	58.8	8	61.94	27	6.7	10
April 10	47.74	25	12.4	1	31.72	45	54.8	22	12.66	24	59.6	12	62.21	25	7.7	15
20	47.99	23	12.3	2	32.17	38	57.0	26	12.90	22	60.8	15	62.46	22	9.2	19
30	48.22	21	12.1	3	32.55	31	59.6	30	13.12	20	62.3	17	62.68	20	11.1	21
Mai 10	48.43	19	11.8	3	32.86	22	62.6	32	13.32	17	64.0	19	62.88	17	13.2	23
20	48.62	16	11.5	4	33.08	14	65.8	34	13.49	14	65.9	20	63.05	14	15.5	25
30	48.78	12	11.1	4	33.22	4	69.2	34	13.63	10	67.9	21	63.19	10	18.0	25
Juni 9	48.90	9	10.7	4	33.26	— 4	72.6	33	13.73	7	70.0	20	63.29	6	20.5	24
19	48.99	5	10.3	4	33.22	13	75.9	32	13.80	3	72.0	20	63.35	2	22.9	24
29	49.04	1	9.9	4	33.09	22	79.1	29	13.83	0	74.0	18	63.37	— 2	25.3	22
Juli 9	49.05	— 3	9.5	3	32.87	29	82.0	26	13.83	4	75.8	16	63.35	6	27.5	20
19	49.02	6	9.2	3	32.58	37	84.6	23	13.79	8	77.4	15	63.29	10	29.5	18
29	48.96	10	8.9	2	32.21	43	86.9	18	13.71	12	78.9	12	63.19	13	31.3	15
Aug. 8	48.86	13	8.7	3	31.78	48	88.7	14	13.59	14	80.1	10	63.06	16	32.8	11
18	48.73	16	8.4	2	31.30	52	90.1	9	13.45	17	81.1	7	62.90	19	33.9	8
28	48.57	18	8.2	2	30.78	54	91.0	4	13.28	18	81.8	4	62.71	20	34.7	5
Sept. 7	48.39	18	8.0	2	30.24	56	91.4	— 2	13.10	20	82.2	1	62.51	22	35.2	1
17	48.21	18	7.8	2	29.68	56	91.2	6	12.90	19	82.3	— 2	62.29	21	35.3	— 3
27	48.03	17	7.6	2	29.12	53	90.6	12	12.71	18	82.1	5	62.08	20	35.0	7
Oct. 7	47.86	14	7.4	1	28.59	50	89.4	17	12.53	16	81.6	8	61.88	19	34.3	11
17	47.72	11	7.3	1	28.09	44	87.7	22	12.37	13	80.8	11	61.69	15	33.2	14
27	47.61	8	7.2	0	27.65	38	85.5	26	12.24	10	79.7	13	61.54	11	31.8	17
Nov. 6	47.53	3	7.2	2	27.27	29	82.9	30	12.14	6	78.4	17	61.43	7	30.1	21
16	47.50	— 2	7.4	2	26.98	20	79.9	33	12.08	0	76.7	19	61.36	3	28.0	24
26	47.52	7	7.6	4	26.78	10	76.6	35	12.08	4	74.8	21	61.33	— 3	25.6	25
Dec. 6	47.59	13	8.0	6	26.68	— 1	73.1	40	12.12	10	72.7	24	61.36	9	23.1	30
16	[9] 47.72	17	8.6	6	[10] 26.69	12	69.1	37	[11] 12.22	14	70.3	23	[11] 61.45	14	20.1	28
26	47.89	21	9.2	8	26.81	23	65.4	36	12.36	18	68.0	23	61.59	17	17.3	27
36	48.10		10.0		27.04		61.8		12.54		65.7		61.76		14.6	
Mittl. Ort	45.35		14.0		30.12		67.2		10.68		65.9		60.34		16.3	
			598)				236)				237)				238)	

1902	π Herculis. 3ᵐ.1.				ϑ Ophiuchi. 3ᵐ.4.				β Draconis. 2ᵐ.6.				α Ophiuchi. 2ᵐ.0.			
	AR.		Decl. +		AR.		Decl. −		AR.		Decl. +		AR.		Decl. +	
	17ʰ 11ᵐ		36° 54′		17ʰ 15ᵐ		24° 54′		17ʰ 28ᵐ		52° 22′		17ʰ 30ᵐ		12° 37′	
Jan. 0	36.81	21	70.2	30	58.86	24	0.0	2	11.19	19	26.5	34	22.37	18	56.3	22
10	37.02	24	67.2	28	59.10	27	0.2	3	11.38	26	23.1	31	22.55	22	54.1	20
20	37.26	28	64.4	25	59.37	29	0.5	3	11.64	31	20.0	28	22.77	24	52.1	19
30	37.54	30	61.9	21	59.66	31	0.8	4	11.95	35	17.2	24	23.01	27	50.2	16
Febr. 9	37.84	32	59.8	16	59.97	32	1.2	4	12.30	38	14.8	18	23.28	28	48.6	13
19	38.16	33	58.2	10	60.29	32	1.6	4	12.68	40	13.0	12	23.56	28	47.3	9
März 1	38.49	33	57.2	4	60.61	32	2.0	4	13.08	41	11.8	6	23.84	29	46.4	5
11	38.82	33	56.8	1	60.93	32	2.4	3	13.49	41	11.2	1	24.13	29	45.9	1
21	39.15	31	56.9	8	61.25	31	2.7	3	13.90	39	11.3	8	24.42	28	45.8	3
31	39.46	30	57.7	13	61.56	29	3.0	2	14.29	37	12.1	14	24.70	27	46.1	8
April 10	39.76	27	59.0	17	61.85	28	3.2	1	14.66	35	13.5	19	24.97	25	46.9	11
20	40.03	24	60.7	22	62.13	26	3.3	1	15.01	30	15.4	23	25.22	24	48.0	14
30	40.27	21	62.9	25	62.39	23	3.4	1	15.31	26	17.7	28	25.46	21	49.4	16
Mai 10	40.48	17	65.4	27	62.62	21	3.5	1	15.57	22	20.5	30	25.67	19	51.0	18
20	40.65	13	68.1	29	62.83	18	3.6	2	15.79	15	23.5	32	25.86	16	52.8	20
30	40.78	9	71.0	29	63.01	15	3.8	1	15.94	10	26.7	34	26.02	12	54.8	20
Juni 9	40.87	5	73.9	29	63.16	10	3.9	1	16.04	5	30.1	32	26.14	9	56.8	20
19	40.92	0	76.8	28	63.26	7	4.0	1	16.09	2	33.3	32	26.23	6	58.8	19
29	40.92	4	79.6	26	63.33	2	4.1	2	16.07	8	36.5	30	26.29	1	60.7	18
Juli 9	40.88	9	82.2	24	63.35	2	4.3	2	15.99	14	39.5	28	26.30	3	62.5	17
19	40.79	13	84.6	20	63.33	6	4.5	1	15.85	19	42.3	24	26.27	6	64.2	14
29	40.66	17	86.6	17	63.27	10	4.6	1	15.66	24	44.7	20	26.21	10	65.6	13
Aug. 8	40.49	20	88.3	13	63.17	13	4.7	0	15.42	28	46.7	16	26.11	13	66.9	10
18	40.29	22	89.6	9	63.04	17	4.7	0	15.14	32	48.3	12	25.98	16	67.9	8
28	40.07	25	90.5	5	62.87	18	4.7	1	14.82	34	49.5	7	25.82	18	68.7	5
Sept. 7	39.82	25	91.0	1	62.69	19	4.6	1	14.48	35	50.2	2	25.64	19	69.2	2
17	39.57	25	91.1	4	62.50	20	4.5	3	14.13	36	50.4	3	25.45	19	69.4	1
27	39.32	24	90.7	9	62.30	18	4.2	3	13.77	35	50.1	8	25.26	18	69.3	3
Oct. 7	39.08	22	89.8	13	62.12	16	3.9	3	13.42	32	49.3	14	25.08	17	69.0	7
17	38.86	19	88.5	17	61.96	13	3.6	4	13.10	29	47.9	18	24.91	15	68.3	9
27	38.67	15	86.8	21	61.83	8	3.2	4	12.81	24	46.1	22	24.76	11	67.4	12
Nov. 6	38.52	10	84.7	25	61.75	4	2.8	4	12.57	19	43.9	27	24.65	6	66.2	15
16	38.42	5	82.2	28	61.71	1	2.4	3	12.38	13	41.2	30	24.59	3	64.7	17
26	38.37	1	79.4	30	61.72	6	2.1	2	12.25	6	38.2	33	24.56	3	63.0	20
Dec. 6	38.38	8	76.4	35	61.78	13	1.9	1	12.19	2	34.9	39	24.59	8	61.0	23
16	[11] 38.46	13	72.9	32	[12] 61.91	17	1.8	0	[15] 12.21	10	31.0	35	[15] 24.67	12	58.7	22
26	38.59	17	69.7	31	62.08	21	1.8	1	12.31	16	27.5	35	24.79	16	56.5	22
36	38.76		66.6		62.29		1.9		12.47		24.0		24.95		54.3	
Mittl. Ort	37.98		69.5		59.36		8.2		13.09		25.4		23.06		52.1	
	239)				599)				240)				241)			

1902	ξ Serpentis. 3ᵐ.6. AR.		ξ Serpentis. Decl. −		ι Herculis. 3ᵐ.3. AR.		ι Herculis. Decl. +		ω Draconis. 5ᵐ.0. AR.		ω Draconis. Decl. +		β Ophiuchi. 3ᵐ.0. AR.		β Ophiuchi. Decl. +	
	17ʰ 31ᵐ		15° 20′		17ʰ 36ᵐ		46° 3′		17ʰ 37ᵐ		68° 47′		17ʰ 38ᵐ		4° 36′	
Jan. 0	57.91ˢ	20	6.4″	7	40.38ˢ	18	31.8″	33	27.64ˢ	22	72.9″	35	37.19ˢ	18	34.2″	18
10	58.11	24	7.1	7	40.56	23	28.5	31	27.86	33	69.4	32	37.37	22	32.4	16
20	58.35	26	7.8	7	40.79	28	25.4	28	28.19	43	66.2	29	37.59	24	30.8	15
30	58.61	28	8.5	6	41.07	31	22.6	24	28.62	51	63.3	25	37.83	26	29.3	14
Febr. 9	58.89	29	9.1	6	41.38	33	20.2	18	29.13	57	60.8	19	38.09	27	27.9	11
19	59.18	30	9.7	4	41.71	36	18.4	13	29.70	61	58.9	13	38.36	28	26.8	8
März 1	59.48	31	10.1	4	42.07	37	17.1	7	30.31	64	57.6	6	38.64	29	26.0	5
11	59.79	30	10.5	2	42.44	37	16.4	— 1	30.95	65	57.0	— 1	38.93	28	25.5	1
21	60.09	29	10.7	0	42.81	36	16.5	6	31.60	63	57.1	7	39.21	28	25.4	— 3
31	60.38	28	10.7	2	43.17	34	17.1	12	32.23	60	57.8	13	39.49	27	25.7	6
April 10	60.66	27	10.5	2	43.51	32	18.3	18	32.83	54	59.1	19	39.76	26	26.3	9
20	60.93	25	10.3	4	43.83	28	20.1	22	33.37	48	61.0	24	40.02	24	27.2	11
30	61.18	24	9.9	4	44.11	25	22.3	26	33.85	40	63.4	29	40.26	22	28.3	13
Mai 10	61.42	21	9.5	5	44.36	21	24.9	29	34.25	31	66.3	31	40.48	20	29.6	15
20	61.63	18	9.0	5	44.57	17	27.8	31	34.56	21	69.4	33	40.68	17	31.1	16
30	61.81	15	8.5	5	44.74	12	30.9	32	34.77	11	72.7	34	40.85	14	32.7	16
Juni 9	61.96	11	8.0	5	44.86	6	34.1	32	34.88	1	76.1	34	40.99	10	34.3	17
19	62.07	8	7.5	4	44.92	1	37.3	31	34.89	— 10	79.5	34	41.09	7	36.0	15
29	62.15	3	7.1	4	44.93	— 4	40.4	30	34.79	19	82.9	32	41.16	2	37.5	15
Juli 9	62.18	— 1	6.7	4	44.89	10	43.4	27	34.60	29	86.1	29	41.18	— 1	39.0	13
19	62.17	4	6.3	2	44.79	14	46.1	24	34.31	38	89.0	25	41.17	5	40.3	12
29	62.13	9	6.1	3	44.65	19	48.5	21	33.93	46	91.5	22	41.12	8	41.5	11
Aug. 8	62.04	12	5.8	2	44.46	23	50.6	17	33.47	52	93.7	18	41.04	12	42.6	8
18	61.92	14	5.6	2	44.23	27	52.3	12	32.95	58	95.5	13	40.92	15	43.4	6
28	61.78	17	5.4	1	43.96	29	53.5	8	32.37	61	96.8	8	40.77	17	44.0	5
Sept. 7	61.61	18	5.3	2	43.67	30	54.3	3	31.76	64	97.6	3	40.60	18	44.5	2
17	61.43	19	5.1	1	43.37	31	54.6	— 2	31.12	65	97.9	— 2	40.42	19	44.7	0
27	61.24	18	5.0	1	43.06	30	54.4	6	30.47	64	97.7	8	40.23	18	44.7	2
Oct. 7	61.06	16	4.9	0	42.76	28	53.8	12	29.83	60	96.9	13	40.05	16	44.5	4
17	60.90	13	4.9	0	42.48	25	52.6	16	29.23	55	95.6	18	39.89	14	44.1	7
27	60.77	9	4.9	0	42.23	21	51.0	21	28.68	49	93.8	22	39.75	10	43.4	8
Nov. 6	60.68	5	4.9	2	42.02	16	48.9	25	28.19	41	91.6	27	39.65	7	42.6	11
16	60.63	1	5.1	2	41.86	10	46.4	29	27.78	31	88.9	31	39.58	3	41.5	13
26	60.62	— 4	5.3	4	41.76	5	43.5	31	27.47	20	85.8	33	39.55	— 3	40.2	15
Dec. 6	60.66	11	5.7	5	41.71	— 2	40.4	34	27.27	9	82.5	35	39.58	7	38.7	16
16	15 60.77	14	6.2	5	41.73	9	37.0	37	27.18	— 4	79.0	40	39.65	12	37.1	19
26	60.91	18	6.7	7	17 41.82	15	33.3	34	17 27.22	16	75.0	36	17 39.77	16	35.2	18
36	61.09		7.4		41.97		29.9		27.38		71.4		39.93		33.4	
Mittl. Ort	58.43		13.5		41.93		29.5		31.49		71.3		37.82		28.9	
	600)				244)				483)				245)			

1902	μ Herculis. $3^m.3$.				ψ Drac. austr. $4^m.6$.				ξ Draconis. $3^m.3$.				ϑ Herculis. $4^m.0$.			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. +		AR.		Decl. +	
	$17^h\ 42^m$		$27°\ 46'$		$17^h\ 43^m$		$72°\ 11'$		$17^h\ 51^m$		$56°\ 53'$		$17^h\ 52^m$		$37°\ 15'$	
Jan. 0	36.42	17	43.4	28	35.96	23	51.6	35	48.06	17	19.5	35	52.23	15	51.8	30
10	36.59	21	40.6	27	36.19	35	48.1	33	48.23	23	16.0	33	52.38	20	48.8	29
20	36.80	24	37.9	24	36.54	47	44.8	30	48.46	30	12.7	30	52.58	24	45.9	27
30	37.04	26	35.5	21	37.01	57	41.8	25	48.76	35	9.7	25	52.82	28	43.2	23
Febr. 9	37.30	29	33.4	16	37.58	66	39.3	19	49.11	39	7.2	21	53.10	30	40.9	19
19	37.59	30	31.8	12	38.24	71	37.4	14	49.50	43	5.1	14	53.40	31	39.0	13
März 1	37.89	30	30.6	6	38.95	74	36.0	8	49.93	44	3.7	8	53.71	33	37.7	8
11	38.19	31	30.0	1	39.69	75	35.2	0	50.37	45	2.9	2	54.04	33	36.9	1
21	38.50	30	29.9	— 4	40.44	74	35.2	6	50.82	44	2.7	— 5	54.37	32	36.8	— 4
31	38.80	28	30.3	10	41.18	70	35.8	13	51.26	43	3.2	12	54.69	32	37.2	10
April 10	39.08	28	31.3	14	41.88	65	37.1	19	51.69	39	4.4	17	55.01	30	38.2	16
20	39.36	25	32.7	18	42.53	56	39.0	23	52.08	36	6.1	23	55.31	27	39.8	20
30	39.61	23	34.5	21	43.09	47	41.3	27	52.44	32	8.4	27	55.58	25	41.8	23
Mai 10	39.84	20	36.6	24	43.56	36	44.0	31	52.76	26	11.1	30	55.83	22	44.1	27
20	40.04	16	39.0	26	43.92	25	47.1	33	53.02	20	14.1	32	56.05	17	46.8	29
30	40.20	13	41.6	26	44.17	13	50.4	34	53.22	14	17.3	34	56.22	14	49.7	30
Juni 9	40.33	9	44.2	27	44.30	1	53.8	34	53.36	7	20.7	34	56.36	10	52.7	30
19	40.42	4	46.9	26	44.31	— 12	57.2	33	53.43	0	24.1	33	56.46	4	55.7	29
29	40.46	1	49.5	24	44.19	23	60.5	32	53.43	7	27.4	32	56.50	0	58.6	28
Juli 9	40.47	— 4	51.9	23	43.96	35	63.7	29	53.36	13	30.6	30	56.50	5	61.4	27
19	40.43	8	54.2	20	43.61	45	66.6	27	53.23	20	33.6	27	56.45	10	64.1	24
29	40.35	12	56.2	17	43.16	54	69.3	22	53.03	25	36.3	23	56.35	13	66.5	20
Aug. 8	40.23	15	57.9	15	42.62	63	71.5	18	52.78	30	38.6	19	56.22	18	68.5	17
18	40.08	19	59.4	11	41.99	69	73.3	14	52.48	35	40.5	15	56.04	21	70.2	14
28	39.89	21	60.5	7	41.30	73	74.7	9	52.13	38	42.0	10	55.83	24	71.6	9
Sept. 7	39.68	22	61.2	3	40.57	77	75.6	3	51.75	40	43.0	5	55.59	25	72.5	5
17	39.46	22	61.5	— 1	39.80	78	75.9	— 1	51.35	41	43.5	0	55.34	26	73.0	0
27	39.24	22	61.4	5	39.02	76	75.8	7	50.94	40	43.5	5	55.08	25	73.0	4
Oct. 7	39.02	21	60.9	8	38.26	73	75.1	12	50.54	38	43.0	11	54.83	24	72.6	9
17	38.81	18	60.1	13	37.53	68	73.9	17	50.16	36	41.9	15	54.59	22	71.7	14
27	38.63	14	58.8	16	36.85	61	72.2	22	49.80	31	40.4	21	54.37	18	70.3	17
Nov. 6	38.49	11	57.2	21	36.24	51	70.0	27	49.49	25	38.3	24	54.19	14	68.6	22
16	38.38	6	55.1	23	35.73	40	67.3	30	49.24	19	35.9	29	54.05	10	66.4	25
26	38.32	1	52.8	25	35.33	28	64.3	33	49.05	12	33.0	32	53.95	4	63.9	28
Dec. 6	38.31	— 5	50.3	28	35.05	15	61.0	35	48.93	4	29.8	35	53.91	— 2	61.1	30
16	38.36	10	47.5	31	34.90	— 1	57.5	39	48.89	— 5	26.3	39	53.93	8	58.1	35
26	^{18}38.46	14	44.4	29	^{18}34.91	14	53.6	37	^{20}48.94	12	22.4	35	^{20}54.01	13	54.6	32
36	38.60		41.5		35.05		49.9		49.06		18.9		54.14		51.4	
Mittl. Ort	37.38		39.7		40.67		49.3		50.29		16.3		53.43		48.0	
	246)				484)				248)				249)			

1902	ν Ophiuchi. $3^m.6$. AR.	Δ	Decl. −	Δ	35 Draconis. $5^m.0$. AR.	Δ	Decl. +	Δ	γ Draconis. $2^m.3$. AR.	Δ	Decl. +	Δ	67 Ophiuchi. $4^m.0$. AR.	Δ	Decl. +	Δ
	$17^h\,53^m$		$9°\,45'$		$17^h\,53^m$		$76°\,58'$		$17^h\,54^m$		$51°\,29'$		$17^h\,55^m$		$2°\,56'$	
Jan. 0	37.25	18	34.8	9	43.53	22	36.7	34	17.96	15	64.1	35	43.65	17	15.7	16
10	37.43	21	35.7	9	43.75	40	33.3	33	18.11	22	60.6	32	43.82	20	14.1	16
20	37.64	24	36.6	9	44.15	56	30.0	30	18.33	27	57.4	29	44.02	23	12.5	14
30	37.88	27	37.5	7	44.71	72	27.0	26	18.60	32	54.5	26	44.25	25	11.1	13
Febr. 9	38.15	28	38.2	7	45.43	83	24.4	20	18.92	35	51.9	20	44.50	26	9.8	10
19	38.43	28	38.9	4	46.26	92	22.4	15	19.27	38	49.9	15	44.76	28	8.8	8
März 1	38.71	29	39.3	3	47.18	98	20.9	8	19.65	39	48.4	8	45.04	28	8.0	4
11	39.00	29	39.6	1	48.16	100	20.1	1	20.04	40	47.6	2	45.32	29	7.6	1
21	39.29	29	39.7	1	49.16	99	20.0	5	20.44	40	47.4	5	45.61	28	7.5	3
31	39.58	29	39.6	4	50.15	95	20.5	11	20.84	39	47.9	11	45.89	27	7.8	5
April 10	39.87	27	39.2	5	51.10	87	21.6	18	21.23	36	49.0	17	46.16	27	8.3	9
20	40.14	26	38.7	7	51.97	76	23.4	22	21.59	32	50.7	21	46.43	25	9.2	11
30	40.40	24	38.0	7	52.73	64	25.6	26	21.91	29	52.8	26	46.68	24	10.3	13
Mai 10	40.64	22	37.3	9	53.37	50	28.2	30	22.20	25	55.4	30	46.92	21	11.6	14
20	40.86	19	36.4	9	53.87	34	31.2	33	22.45	19	58.4	31	47.13	18	13.0	16
30	41.05	17	35.5	9	54.21	18	34.5	34	22.64	14	61.5	33	47.31	15	14.6	16
Juni 9	41.22	13	34.6	8	54.39	1	37.9	34	22.78	8	64.8	34	47.46	12	16.2	15
19	41.35	9	33.8	8	54.40	16	41.3	33	22.86	2	68.2	33	47.58	9	17.7	15
29	41.44	5	33.0	8	54.24	32	44.6	32	22.88	3	71.5	31	47.67	4	19.2	15
Juli 9	41.49	1	32.2	7	53.92	47	47.8	30	22.85	10	74.6	29	47.71	1	20.7	13
19	41.50	3	31.5	5	53.45	61	50.8	27	22.75	16	77.5	27	47.72	4	22.0	12
29	41.47	7	31.0	5	52.84	74	53.5	23	22.59	21	80.2	23	47.68	7	23.2	10
Aug. 8	41.40	11	30.5	4	52.10	86	55.8	20	22.38	25	82.5	19	47.61	11	24.2	8
18	41.29	14	30.1	3	51.24	93	57.8	15	22.13	30	84.4	15	47.50	14	25.0	6
28	41.15	16	29.8	2	50.31	101	59.3	10	21.83	32	85.9	10	47.36	16	25.6	5
Sept. 7	40.99	17	29.6	1	49.30	106	60.3	5	21.51	34	86.9	5	47.20	18	26.1	2
17	40.82	19	29.5	1	48.24	107	60.8	0	21.17	35	87.4	1	47.02	19	26.3	1
27	40.63	18	29.4	1	47.17	106	60.8	5	20.82	35	87.5	5	46.83	18	26.4	1
Oct. 7	40.45	16	29.5	1	46.11	103	60.3	10	20.47	33	87.0	10	46.65	17	26.3	4
17	40.29	14	29.6	2	45.08	97	59.3	15	20.14	30	86.0	15	46.48	14	25.9	6
27	40.15	11	29.8	3	44.11	87	57.8	20	19.84	26	84.5	20	46.34	12	25.3	7
Nov. 6	40.04	8	30.1	4	43.24	75	55.8	25	19.58	22	82.5	24	46.22	8	24.6	10
16	39.96	3	30.5	5	42.49	62	53.3	29	19.36	15	80.1	28	46.14	3	23.6	12
26	39.93	2	31.0	6	41.87	45	50.4	32	19.21	9	77.3	31	46.11	1	22.4	13
Dec. 6	39.95	7	31.6	8	41.42	28	47.2	34	19.12	3	74.2	33	46.12	5	21.1	15
16	40.02	13	32.4	9	41.14	9	43.8	39	19.09	6	70.9	38	46.17	11	19.6	18
26	[20] 40.15	16	33.3	9	[20] 41.05	12	39.9	35	[21] 19.15	12	67.1	35	[21] 46.28	15	17.8	16
36	40.31		34.2		41.17		36.4		19.27		63.6		46.43		16.2	
Mittl. Ort	37.83		41.5		50.15		33.4		19.79		60.5		44.28		9.9	
	250)				485)				252)				253)			

1902	γ Sagittarii. $3^m.3$.				72 Ophiuchi. $3^m.3$.				o Herculis. $3^m.8$.				μ Sagittarii. $4^m.0$.			
	AR.		Decl. −		AR.		Decl. +		AR.		Decl. +		AR.		Decl. −	
	$17^h\ 59^m$		$30°\ 25'$		$18^h\ 2^m$		$9°\ 32'$		$18^h\ 3^m$		$28°\ 44'$		$18^h\ 7^m$		$21°\ 4'$	
Jan. 0	30.09	21	25.1	4	41.47	15	64.5	20	42.18	14	60.2	28	53.52	18	58.3	1
10	30.30	23	24.7	3	41.62	19	62.5	18	42.32	19	57.4	27	53.70	22	58.4	2
20	30.53	28	24.4	2	41.81	22	60.7	17	42.51	22	54.7	24	53.92	24	58.6	3
30	30.81	29	24.2	2	42.03	25	59.0	15	42.73	25	52.3	22	54.16	27	58.9	2
Febr. 9	31.10	31	24.0	1	42.28	26	57.5	13	42.98	28	50.1	17	54.43	28	59.1	1
19	31.41	33	23.9	1	42.54	27	56.2	9	43.26	29	48.4	13	54.71	30	59.2	1
März 1	31.74	33	23.8	0	42.81	28	55.3	5	43.55	30	47.1	7	55.01	31	59.3	0
11	32.07	34	23.8	1	43.09	29	54.8	1	43.85	31	46.4	2	55.32	30	59.3	0
21	32.41	33	23.7	0	43.38	28	54.7	3	44.16	30	46.2	3	55.62	31	59.3	2
31	32.74	32	23.7	0	43.66	28	55.0	6	44.46	30	46.5	9	55.93	31	59.1	2
April 10	33.06	32	23.7	0	43.94	27	55.6	10	44.76	28	47.4	13	56.24	29	58.9	3
20	33.38	30	23.7	0	44.21	25	56.6	13	45.04	27	48.7	18	56.53	29	58.6	4
30	33.68	28	23.7	1	44.46	24	57.9	16	45.31	25	50.5	21	56.82	27	58.2	4
Mai 10	33.96	26	23.8	1	44.70	21	59.5	17	45.56	22	52.6	24	57.09	24	57.8	3
20	34.22	23	23.9	2	44.91	19	61.2	19	45.78	18	55.0	26	57.33	22	57.5	4
30	34.45	20	24.1	2	45.10	16	63.1	19	45.96	15	57.6	27	57.55	19	57.1	3
Juni 9	34.65	15	24.3	4	45.26	12	65.0	19	46.11	11	60.3	28	57.74	15	56.8	3
19	34.80	12	24.7	4	45.38	8	66.9	19	46.22	7	63.1	27	57.89	11	56.5	2
29	34.92	7	25.1	4	45.46	4	68.8	18	46.29	3	65.8	26	58.00	7	56.3	1
Juli 9	34.99	2	25.5	5	45.50	1	70.6	17	46.32	2	68.4	24	58.07	3	56.2	0
19	35.01	3	26.0	5	45.51	4	72.3	14	46.30	7	70.8	22	58.10	2	56.2	0
29	34.98	7	26.5	4	45.47	7	73.7	13	46.23	10	73.0	20	58.08	6	56.2	0
Aug. 8	34.91	12	26.9	4	45.40	11	75.0	11	46.13	15	75.0	16	58.02	10	56.2	1
18	34.79	15	27.3	3	45.29	14	76.1	8	45.98	18	76.6	13	57.92	13	56.3	0
28	34.64	18	27.6	3	45.15	17	76.9	6	45.80	20	77.9	9	57.79	17	56.3	1
Sept. 7	34.46	20	27.9	1	44.98	18	77.5	4	45.60	21	78.8	5	57.62	18	56.4	0
17	34.26	21	28.0	1	44.80	19	77.9	1	45.39	23	79.3	2	57.44	19	56.4	0
27	34.05	20	27.9	1	44.61	19	78.0	2	45.16	23	79.5	3	57.25	19	56.4	0
Oct. 7	33.85	19	27.8	3	44.42	18	77.8	4	44.93	21	79.2	7	57.06	17	56.4	1
17	33.66	17	27.5	4	44.24	15	77.4	7	44.72	19	78.5	11	56.89	16	56.3	1
27	33.49	13	27.1	5	44.09	13	76.7	10	44.53	16	77.4	15	56.73	12	56.2	1
Nov. 6	33.36	8	26.6	5	43.96	9	75.7	12	44.37	13	75.9	18	56.61	8	56.1	1
16	33.28	3	26.1	6	43.87	5	74.5	15	44.24	8	74.1	22	56.53	4	56.0	1
26	33.25	2	25.5	6	43.82	0	73.0	16	44.16	3	71.9	25	56.49	1	55.9	0
Dec. 6	33.27	7	24.9	5	43.82	4	71.4	18	44.13	2	69.4	27	56.50	6	55.9	0
16	33.34	13	24.4	5	43.86	10	69.6	21	44.15	8	66.7	31	56.56	12	55.9	1
26	[22] 33.47	18	23.9	4	[22] 43.96	13	67.5	20	[23] 44.23	12	63.6	28	[24] 56.68	15	56.0	1
36	33.65		23.5		44.09		65.5		44.35		60.8		56.83		56.1	
Mittl. Ort	30.74		33.1		42.16		58.8		43.16		55.3		54.13		65.6	
	601)				254)				255)				602)			

1902	η Serpentis. 3ᵐ.0. AR.		Decl. −		109 Herculis. 4ᵐ.0. AR.		Decl. +		b Draconis. 5ᵐ.1. AR.		Decl. +		χ Draconis. 3ᵐ.8. AR.		Decl. +	
	18ʰ 16ᵐ		2° 55′		18ʰ 19ᵐ		21° 43′		18ʰ 22ᵐ		58° 44′		18ʰ 22ᵐ		72° 41′	
Jan. 0	13.63ˢ	15	21.1″	13	30.44ˢ	14	35.2″	25	26.40ˢ	11	43.3″	35	44.66ˢ	11	31.7″	36
10	13.78	18	22.4	12	30.58	17	32.7	24	26.51	19	39.8	34	44.77	25	28.1	34
20	13.96	22	23.6	11	30.75	21	30.3	22	26.70	26	36.4	32	45.02	37	24.7	32
30	14.18	24	24.7	10	30.96	23	28.1	20	26.96	32	33.2	28	45.39	49	21.5	28
Febr. 9	14.42	25	25.7	8	31.19	25	26.1	17	27.28	37	30.4	23	45.88	60	18.7	24
19	14.67	27	26.5	6	31.44	28	24.4	12	27.65	42	28.1	18	46.48	68	16.3	18
März 1	14.94	28	27.1	4	31.72	28	23.2	7	28.07	44	26.3	11	47.16	73	14.5	12
11	15.22	28	27.5	0	32.00	30	22.5	3	28.51	46	25.2	5	47.89	76	13.3	6
21	15.50	29	27.5	2	32.30	29	22.2	3	28.97	47	24.7	2	48.65	78	12.7	1
31	15.79	28	27.3	5	32.59	29	22.5	7	29.44	46	24.9	8	49.43	75	12.8	8
April 10	16.07	27	26.8	7	32.88	28	23.2	12	29.90	44	25.7	14	50.18	72	13.6	14
20	16.34	27	26.1	10	33.16	27	24.4	15	30.34	40	27.1	20	50.90	66	15.0	19
30	16.61	25	25.1	11	33.43	25	25.9	19	30.74	37	29.1	24	51.56	57	16.9	24
Mai 10	16.86	23	24.0	12	33.68	23	27.8	22	31.11	31	31.5	29	52.13	48	19.3	29
20	17.09	20	22.8	13	33.91	20	30.0	23	31.42	26	34.4	31	52.61	37	22.2	31
30	17.29	17	21.5	13	34.11	17	32.3	25	31.68	19	37.5	34	52.98	25	25.3	33
Juni 9	17.46	14	20.2	13	34.28	13	34.8	25	31.87	12	40.9	34	53.23	13	28.6	35
19	17.60	11	18.9	13	34.41	9	37.3	25	31.99	5	44.3	35	53.36	0	32.1	34
29	17.71	7	17.6	11	34.50	5	39.8	24	32.04	3	47.8	34	53.36	12	35.5	34
Juli 9	17.78	2	16.5	11	34.55	1	42.2	22	32.01	9	51.2	32	53.24	25	38.9	32
19	17.80	2	15.4	9	34.56	4	44.4	21	31.92	17	54.4	29	52.99	36	42.1	30
29	17.78	5	14.5	8	34.52	8	46.5	18	31.75	23	57.3	27	52.63	47	45.1	27
Aug. 8	17.73	9	13.7	6	34.44	12	48.3	15	31.52	29	60.0	23	52.16	57	47.8	23
18	17.64	13	13.1	5	34.32	15	49.8	12	31.23	35	62.3	19	51.59	65	50.1	19
28	17.51	16	12.6	3	34.17	18	51.0	9	30.88	38	64.2	14	50.94	71	52.0	15
Sept. 7	17.35	17	12.3	2	33.99	20	51.9	6	30.50	41	65.6	9	50.23	76	53.5	9
17	17.18	18	12.1	1	33.79	20	52.5	2	30.09	43	66.5	4	49.47	79	54.4	5
27	17.00	19	12.0	1	33.59	21	52.7	1	29.66	44	66.9	1	48.68	80	54.9	1
Oct. 7	16.81	17	12.1	3	33.38	20	52.6	5	29.22	42	66.8	6	47.88	78	54.8	6
17	16.64	15	12.4	4	33.18	18	52.1	9	28.80	40	66.2	12	47.10	75	54.2	11
27	16.49	13	12.8	5	33.00	15	51.2	12	28.40	36	65.0	16	46.35	69	53.1	17
Nov. 6	16.36	9	13.3	7	32.85	12	50.0	15	28.04	31	63.4	22	45.66	61	51.4	21
16	16.27	5	14.0	8	32.73	8	48.5	19	27.73	25	61.2	26	45.05	51	49.3	27
26	16.22	1	14.8	10	32.65	4	46.6	21	27.48	18	58.6	29	44.54	39	46.6	30
Dec. 6	16.21	4	15.8	11	32.61	2	44.5	23	27.30	10	55.7	33	44.15	27	43.6	32
16	16.25	10	16.9	13	32.63	6	42.2	26	27.20	3	52.4	34	43.88	13	40.4	35
26	[25] 16.35	13	18.2	13	32.69	12	39.6	27	27.17	7	49.0	39	43.75	1	36.9	40
36	16.48		19.5		[26] 32.81		36.9		[27] 27.24		45.1		[27] 43.76		32.9	
Mittl. Ort	14.24		27.7		31.29		29.2		28.73		37.2		49.36		25.3	
	257)				258)				488)				259)			

1902	α Lyrae. 1^m.*)				110 Herculis. 4^m.0.				β Lyrae. 3.4...4^m.5.				σ Sagittarii. 2^m.3.			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. +		AR.		Decl. —	
	18^h 33^m		38° 41'		18^h 41^m		20° 27'		18^h 46^m		33° 14'		18^h 49^m		26° 24'	
Jan. 0	36.02	11	39.1	31	25.79	11	14.6	24	26.65	10	63.7	32	10.61	16	61.2	3
10	36.13	15	36.0	30	25.90	15	12.2	23	[1] 26.75	14	60.5	29	[2] 10.77	18	60.9	4
20	36.28	21	33.0	28	26.05	18	9.9	22	26.89	18	57.6	27	10.95	21	60.5	3
30	36.49	24	30.2	25	26.23	22	7.7	20	27.07	22	54.9	24	11.16	25	60.2	3
Febr. 9	36.73	27	27.7	21	26.45	24	5.7	16	27.29	25	52.5	20	11.41	27	59.9	3
19	37.00	30	25.6	16	26.69	26	4.1	12	27.54	27	50.5	16	11.68	28	59.6	4
März 1	37.30	32	24.0	10	26.95	27	2.9	8	27.81	30	48.9	10	11.96	30	59.2	4
11	37.62	33	23.0	5	27.22	29	2.1	4	28.11	31	47.9	5	12.26	32	58.8	4
21	37.95	33	22.5	2	27.51	29	1.7	1	28.42	31	47.4	0	12.58	32	58.4	5
31	38.28	33	22.7	7	27.80	29	1.8	7	28.73	32	47.4	6	12.90	32	57.9	5
April 10	38.61	32	23.4	13	28.09	29	2.5	11	29.05	31	48.0	12	13.22	32	57.4	5
20	38.93	31	24.7	18	28.38	28	3.6	14	29.36	30	49.2	16	13.54	31	56.9	5
30	39.24	28	26.5	23	28.66	26	5.0	18	29.66	28	50.8	21	13.85	30	56.4	4
Mai 10	39.52	26	28.8	25	28.92	24	6.8	21	29.94	26	52.9	24	14.15	28	56.0	4
20	39.78	22	31.3	29	29.16	22	8.9	23	30.20	23	55.3	26	14.43	26	55.6	3
30	40.00	18	34.2	30	29.38	19	11.2	25	30.43	19	57.9	29	14.69	24	55.3	3
Juni 9	40.18	14	37.2	32	29.57	15	13.7	25	30.62	16	60.8	29	14.93	19	55.0	1
19	40.32	9	40.4	31	29.72	11	16.2	24	30.78	11	63.7	30	15.12	16	54.9	0
29	40.41	4	43.5	30	29.83	7	18.6	24	30.89	6	66.7	29	15.28	12	54.9	1
Juli 9	40.45	1	46.5	29	29.90	3	21.0	23	30.95	1	69.6	28	15.40	7	55.0	2
19	40.44	6	49.4	27	29.93	2	23.3	21	30.96	3	72.4	26	15.47	2	55.2	3
29	40.38	11	52.1	23	29.91	6	25.4	18	30.93	8	75.0	23	15.49	3	55.5	4
Aug. 8	40.27	16	54.4	21	29.85	10	27.2	16	30.85	12	77.3	21	15.46	8	55.9	3
18	40.11	19	56.5	18	29.75	13	28.8	14	30.73	16	79.4	17	15.38	11	56.2	4
28	39.92	22	58.3	13	29.62	17	30.2	10	30.57	20	81.1	14	15.27	15	56.6	4
Sept. 7	39.70	25	59.6	9	29.45	19	31.2	7	30.37	22	82.5	9	15.12	18	57.0	3
17	39.45	26	60.5	4	29.26	20	31.9	3	30.15	24	83.4	6	14.94	19	57.3	2
27	39.19	27	60.9	0	29.06	21	32.2	0	29.91	24	84.0	1	14.75	20	57.5	1
Oct. 7	38.92	25	60.9	5	28.85	20	32.2	3	29.67	23	84.1	4	14.55	19	57.6	1
17	38.67	24	60.4	9	28.65	18	31.9	7	29.44	23	83.7	7	14.36	18	57.7	1
27	38.43	21	59.5	14	28.47	16	31.2	11	29.21	20	83.0	12	14.18	15	57.6	1
Nov. 6	38.22	18	58.1	19	28.31	13	30.1	13	29.01	16	81.8	17	14.03	12	57.5	2
16	38.04	13	56.2	22	28.18	9	28.8	17	28.85	13	80.1	20	13.91	7	57.3	3
26	37.91	8	54.0	26	28.09	5	27.1	20	28.72	8	78.1	23	13.84	3	57.0	3
Dec. 6	37.83	3	51.4	29	28.04	1	25.1	22	28.64	3	75.8	26	13.81	2	56.7	4
16	37.80	2	48.5	30	28.03	4	22.9	23	28.61	1	73.2	28	13.83	6	56.3	3
26	37.82	8	45.5	34	28.07	9	20.6	26	28.62	7	70.4	32	13.89	13	56.0	3
36	[29] 37.90		42.1		[31] 28.16		18.0		[32] 28.69		67.2		[33] 14.02		55.7	
Mittl. Ort	37.22		32.4		26.60		7.5		27.69		55.8		11.31		67.8	
	260)				263)				264)				603)			

*) Die jährliche Parallaxe ist bereits angebracht.

1902	o Draconis. 4m.6. AR.		Decl. +		ϑ Serpentis pr. 4m.2 AR.		Decl. +		R Lyrae. 4.3...4m.6. AR.		Decl. +		γ Lyrae. 3m.3. AR.		Decl. +	
	18h 49m		59° 15′		18h 51m		4° 4′		18h 52m		43° 48′		18h 55m		32° 33′	
Jan. 0	43.04s	6	75.4″	38	20.15s	13	41.0″	17	19.82s	9	68.6″	35	15.60s	9	26.2″	31
10	^{2}43.10	14	71.6	34	^{2}20.28	15	39.3	15	^{2}19.91	13	65.1	32	^{3}15.69	13	23.1	28
20	43.24	21	68.2	33	20.43	18	37.8	14	20.04	18	61.9	30	15.82	18	20.3	27
30	43.45	28	64.9	30	20.61	20	36.4	12	20.22	23	58.9	27	16.00	21	17.6	24
Febr. 9	43.73	35	61.9	25	20.81	24	35.2	10	20.45	27	56.2	23	16.21	24	15.2	20
19	44.08	39	59.4	21	21.05	25	34.2	8	20.72	30	53.9	18	16.45	27	13.2	16
März 1	44.47	43	57.3	14	21.30	26	33.4	4	21.02	32	52.1	13	16.72	28	11.6	11
11	44.90	46	55.9	8	21.56	27	33.0	1	21.34	34	50.8	7	17.00	30	10.5	6
21	45.36	47	55.1	2	21.83	28	32.9	— 3	21.68	35	50.1	1	17.30	31	9.9	0
31	45.83	47	54.9	— 5	22.11	29	33.2	6	22.03	36	50.0	— 6	17.61	32	9.9	5
April 10	46.30	46	55.4	12	22.40	28	33.8	9	22.39	35	50.6	11	17.93	31	10.4	11
20	46.76	44	56.6	17	22.68	28	34.7	12	22.74	33	51.7	17	18.24	31	11.5	16
30	47.20	40	58.3	22	22.96	26	35.9	14	23.07	32	53.4	21	18.55	29	13.1	20
Mai 10	47.60	36	60.5	27	23.22	25	37.3	16	23.39	28	55.5	25	18.84	26	15.1	24
20	47.96	30	63.2	30	23.47	23	38.9	17	23.67	25	58.0	29	19.10	23	17.5	26
30	48.26	24	66.2	33	23.70	20	40.6	18	23.92	21	60.9	31	19.33	21	20.1	28
Juni 9	48.50	17	69.5	34	23.90	17	42.4	18	24.13	16	64.0	32	19.54	16	22.9	30
19	48.67	10	72.9	35	24.07	13	44.2	17	24.29	11	67.2	33	19.70	12	25.9	29
29	48.77	2	76.4	34	24.20	9	45.9	16	24.40	6	70.5	32	19.82	7	28.8	29
Juli 9	48.79	— 5	79.8	34	24.29	5	47.5	15	24.46	0	73.7	31	19.89	3	31.7	28
19	48.74	13	83.2	31	24.34	1	49.0	14	24.46	5	76.8	30	19.92	— 2	34.5	26
29	48.61	20	86.3	29	24.35	— 3	50.4	12	24.41	10	79.8	27	19.90	7	37.1	24
Aug. 8	48.41	26	89.2	26	24.32	8	51.6	11	24.31	16	82.5	23	19.83	12	39.5	21
18	48.15	32	91.8	22	24.24	11	52.7	8	24.15	20	84.8	20	19.71	15	41.6	18
28	47.83	36	94.0	18	24.13	14	53.5	6	23.95	23	86.8	16	19.56	19	43.4	14
Sept. 7	47.47	40	95.8	13	23.99	16	54.1	4	23.72	26	88.4	12	19.37	21	44.8	10
17	47.07	43	97.1	8	23.83	18	54.5	2	23.46	29	89.6	7	19.16	23	45.8	6
27	46.64	44	97.9	3	23.65	18	54.7	0	23.17	29	90.3	3	18.93	24	46.4	2
Oct. 7	46.20	43	98.2	— 2	23.47	18	54.7	3	22.88	28	90.6	— 3	18.69	23	46.6	— 2
17	45.77	42	98.0	8	23.29	17	54.4	4	22.60	27	90.3	7	18.46	23	46.4	7
27	45.35	39	97.2	13	23.12	14	54.0	6	22.33	25	89.6	13	18.23	20	45.7	11
Nov. 6	44.96	34	95.9	18	22.98	11	53.4	9	22.08	22	88.3	17	18.03	16	44.6	16
16	44.62	29	94.1	23	22.87	8	52.5	10	21.86	17	86.6	21	17.87	14	43.0	19
26	44.33	22	91.8	27	22.79	4	51.5	12	21.69	13	84.5	26	17.73	9	41.1	22
Dec. 6	44.11	15	89.1	31	22.75	0	50.3	14	21.56	7	81.9	28	17.64	4	38.9	25
16	43.96	8	86.0	33	22.75	5	48.9	15	21.49	1	79.1	30	17.60	— 1	36.4	27
26	43.88	— 1	82.7	38	22.80	10	47.4	17	21.48	— 5	76.1	35	17.61	7	33.7	32
36	^{33}43.89		78.9		^{33}22.90		45.7		^{34}21.53		72.6		^{34}17.68		30.5	
Mittl. Ort	45.31		66.4		20.81		33.7		21.17		60.0		16.61		17.8	
	265)				266)				492)				268)			

1902	ζ Aquilae. $3^m.0$ AR. $19^h\ 0^m$ (s)		Decl. + $13°\ 42'$ (")		λ Aquilae. $3^m.1$ AR. $19^h\ 1^m$ (s)		Decl. − $5°\ 1'$ (")	
Jan. 0	53.57	11	70.9	23	2.21	12	40.2	10
10	53.68	13	68.6	19	2.33	15	41.2	10
20	53.81	17	66.7	19	2.48	17	42.2	8
30	53.98	20	64.8	17	2.65	21	43.0	8
Febr. 9	54.18	22	63.1	14	2.86	23	43.8	6
19	54.40	24	61.7	10	3.09	25	44.4	3
März 1	54.64	26	60.7	7	3.34	26	44.7	2
11	54.90	28	60.0	3	3.60	27	44.9	1
21	55.18	28	59.7	2	3.87	29	44.8	4
31	55.46	29	59.9	5	4.16	28	44.4	6
April 10	55.75	28	60.4	10	4.44	29	43.8	8
20	56.03	28	61.4	13	4.73	28	43.0	10
30	56.31	27	62.7	17	5.01	28	42.0	12
Mai 10	56.58	26	64.4	19	5.29	26	40.8	13
20	56.84	23	66.3	20	5.55	24	39.5	14
30	57.07	20	68.3	22	5.79	21	38.1	13
Juni 9	57.27	17	70.5	23	6.00	18	36.8	14
19	57.44	14	72.8	22	6.18	15	35.4	12
29	57.58	10	75.0	22	6.33	11	34.2	12
Juli 9	57.68	5	77.2	20	6.44	7	33.0	11
19	57.73	1	79.2	19	6.51	2	31.9	9
29	57.74	4	81.1	17	6.53	2	31.0	8
Aug. 8	57.70	7	82.8	14	6.51	6	30.2	6
18	57.63	12	84.2	12	6.45	10	29.6	5
28	57.51	14	85.4	9	6.35	13	29.1	3
Sept. 7	57.37	17	86.3	7	6.22	16	28.8	2
17	57.20	19	87.0	4	6.06	17	28.6	0
27	57.01	19	87.4	1	5.89	18	28.6	0
Oct. 7	56.82	19	87.5	3	5.71	18	28.6	2
17	56.63	18	87.2	5	5.53	16	28.8	3
27	56.45	15	86.7	8	5.37	15	29.1	5
Nov. 6	56.30	13	85.9	11	5.22	12	29.6	5
16	56.17	10	84.8	13	5.10	8	30.1	7
26	56.07	6	83.5	16	5.02	4	30.8	8
Dec. 6	56.01	1	81.9	18	4.98	1	31.6	9
16	56.00	3	80.1	20	4.99	4	32.5	9
26	56.03	8	78.1	22	5.03	9	33.4	10
36	56.11		75.9		5.12		34.4	
Mittl. Ort	54.29		63.0		2.84		47.2	
	270)				269)			

1902	π Sagittarii. $3^m.1$ AR. $19^h\ 3^m$ (s)		Decl. − $21°\ 10'$ (")		δ Draconis. $3^m.0$ AR. $19^h\ 12^m$ (s)		Decl. + $67°\ 29'$ (")	
Jan. 0	55.48	13	41.0	0	28.87	2	32.0	38
10	55.61	16	41.0	1	28.85	9	28.2	35
20	55.77	20	40.9	1	28.94	19	24.7	34
30	55.97	22	40.8	1	29.13	30	21.3	31
Febr. 9	56.19	24	40.7	2	29.43	38	18.2	27
19	56.43	27	40.5	2	29.81	46	15.5	23
März 1	56.70	28	40.3	4	30.27	53	13.2	18
11	56.98	30	39.9	5	30.80	57	11.4	11
21	57.28	30	39.4	5	31.37	60	10.3	5
31	57.58	31	38.9	6	31.97	62	9.8	2
April 10	57.89	31	38.3	7	32.59	60	10.0	8
20	58.20	30	37.6	7	33.19	58	10.8	14
30	58.50	30	36.9	7	33.77	54	12.2	20
Mai 10	58.80	28	36.2	7	34.31	48	14.2	25
20	59.08	26	35.5	7	34.79	41	16.7	28
30	59.34	24	34.8	6	35.20	33	19.5	32
Juni 9	59.58	20	34.2	4	35.53	25	22.7	34
19	59.78	16	33.8	4	35.78	14	26.1	35
29	59.94	13	33.4	3	35.92	5	29.6	36
Juli 9	60.07	8	33.1	1	35.97	5	33.2	35
19	60.15	4	33.0	0	35.92	15	36.7	33
29	60.19	2	33.0	1	35.77	25	40.0	32
Aug. 8	60.17	6	33.1	1	35.52	33	43.2	29
18	60.11	10	33.2	2	35.19	41	46.1	25
28	60.01	13	33.4	2	34.78	48	48.6	21
Sept. 7	59.88	16	33.6	3	34.30	53	50.7	17
17	59.72	18	33.9	2	33.77	57	52.4	12
27	59.54	19	34.1	2	33.20	59	53.6	7
Oct. 7	59.35	19	34.3	1	32.61	60	54.3	1
17	59.16	18	34.4	1	32.01	59	54.4	4
27	58.98	15	34.5	1	31.42	56	54.0	10
Nov. 6	58.83	12	34.6	0	30.86	52	53.0	14
16	58.71	8	34.6	0	30.34	45	51.6	20
26	58.63	4	34.6	0	29.89	38	49.6	25
Dec. 6	58.59	0	34.6	0	29.51	29	47.1	29
16	58.59	5	34.6	1	29.22	19	44.2	32
26	58.64	10	34.5	0	29.03	9	41.0	34
36	58.74		34.5		28.94		37.6	
Mittl. Ort	56.15		47.4		32.00		20.7	
	604)				271)			

1902	ϑ Lyrae. 4ᵐ.3.				ω Aquilae. 5ᵐ.6.				κ Cygni. 4ᵐ.0.				τ Draconis. 4ᵐ.8.			
	AR.	Δ	Decl. +	Δ	AR.	Δ	Decl. +	Δ	AR.	Δ	Decl. +	Δ	AR.	Δ	Decl. +	Δ
	19h 12m		37° 57′		19h 13m		11° 25′		19h 14m		53° 11′		19h 17m		73° 10′	
Jan. 0	56.79 s	6	41.6″	33	12.29 s	9	14.5″	20	48.61 s	3	25.4″	37	22.14 s	9	37.2″	37
10	[7] 56.85	11	38.3	30	[7] 12.38	12	12.5	19	[7] 48.64	10	21.7	33	[8] 22.05	— 7	33.5	35
20	56.96	15	35.3	28	12.50	16	10.6	17	48.74	16	18.4	32	22.12	21	30.0	33
30	57.11	20	32.5	26	12.66	19	8.9	15	48.90	22	15.2	30	22.33	35	26.7	32
Febr. 9	57.31	23	29.9	23	12.85	21	7.4	13	49.12	27	12.2	26	22.68	47	23.5	28
19	57.54	27	27.6	19	13.06	24	6.1	10	49.39	32	9.6	22	23.15	57	20.7	24
März 1	57.81	29	25.7	13	13.30	25	5.1	6	49.71	36	7.4	16	23.72	66	18.3	18
11	58.10	31	24.4	8	13.55	27	4.5	3	50.07	38	5.8	10	24.38	73	16.5	12
21	58.41	32	23.6	2	13.82	28	4.2	— 2	50.45	41	4.8	4	25.11	78	15.3	6
31	58.73	33	23.4	— 4	14.10	28	4.4	5	50.86	41	4.4	— 2	25.89	79	14.7	0
April 10	59.06	33	23.8	10	14.38	29	4.9	10	51.27	41	4.6	9	26.68	78	14.7	7
20	59.39	33	24.8	15	14.67	28	5.9	13	51.68	40	5.5	15	27.46	74	15.4	13
30	59.72	31	26.3	19	14.95	28	7.2	15	52.08	38	7.0	20	28.20	69	16.7	19
Mai 10	60.03	28	28.2	24	15.23	26	8.7	18	52.46	35	9.0	25	28.89	62	18.6	24
20	60.31	26	30.6	27	15.49	24	10.5	20	52.81	30	11.5	28	29.51	52	21.0	28
30	60.57	23	33.3	29	15.73	21	12.5	21	53.11	26	14.3	31	30.03	41	23.8	31
Juni 9	60.80	18	36.2	31	15.94	18	14.6	22	53.37	20	17.4	34	30.44	30	26.9	33
19	60.98	14	39.3	31	16.12	15	16.8	22	53.57	14	20.8	34	30.74	17	30.2	35
29	61.12	9	42.4	31	16.27	11	19.0	20	53.71	7	24.2	35	30.91	4	33.7	36
Juli 9	61.21	4	45.5	31	16.38	7	21.0	20	53.78	1	27.7	34	30.95	— 9	37.3	35
19	61.25	— 2	48.6	28	16.45	2	23.0	18	53.79	— 5	31.1	32	30.86	21	40.8	34
29	61.23	6	51.4	27	16.47	— 2	24.8	16	53.74	12	34.3	30	30.65	34	44.2	32
Aug. 8	61.17	11	54.1	24	16.45	6	26.4	14	53.62	17	37.3	27	30.31	45	47.4	29
18	61.06	16	56.5	20	16.39	10	27.8	12	53.45	23	40.0	24	29.86	55	50.3	26
28	60.90	19	58.5	17	16.29	14	29.0	9	53.22	28	42.4	20	29.31	65	52.9	22
Sept. 7	60.71	23	60.2	13	16.15	16	29.9	7	52.94	32	44.4	16	28.66	71	55.1	18
17	60.48	24	61.5	9	15.99	18	30.6	4	52.62	34	46.0	11	27.95	77	56.9	13
27	60.24	26	62.4	4	15.81	19	31.0	1	52.28	35	47.1	6	27.18	80	58.2	8
Oct. 7	59.98	26	62.8	— 1	15.62	18	31.1	— 2	51.93	36	47.7	1	26.38	82	59.0	3
17	59.72	24	62.7	5	15.44	18	30.9	4	51.57	35	47.8	— 4	25.56	80	59.3	— 3
27	59.48	23	62.2	10	15.26	16	30.5	7	51.22	33	47.4	10	24.76	77	59.0	8
Nov. 6	59.25	20	61.2	14	15.10	13	29.8	10	50.89	29	46.4	15	23.99	71	58.2	14
16	59.05	16	59.8	19	14.97	10	28.8	12	50.60	26	44.9	20	23.28	64	56.8	19
26	58.89	12	57.9	22	14.87	6	27.6	14	50.34	20	42.9	25	22.64	55	54.9	24
Dec. 6	58.77	7	55.7	26	14.81	3	26.2	17	50.14	14	40.4	28	22.09	44	52.5	28
16	58.70	3	53.1	28	14.78	— 2	24.5	18	50.00	8	37.6	31	21.65	30	49.7	31
26	58.67	— 3	50.3	30	14.80	6	22.7	19	49.92	2	34.5	33	21.35	17	46.6	34
36	58.70		47.3		14.86		20.8		49.90		31.2		21.18		43.2	
Mittl. Ort	57.88		31.8		12.97		6.5		50.30		14.6		26.46		25.2	
	496)				495)				272)				273)			

1902	δ Aquilae. 3m.3.				β Cygni. 3m.0.				ι Cygni. 4m.1.				h Sagittarii. 4m.6.			
	AR.		Decl. +		AR.		Decl. +		AR.		Decl. +		AR.		Decl. —	
	19h 20m		2° 55′		19h 26m		27° 45′		19h 27m		51° 31′		19h 30m		25° 5′	
Jan. 0	32.78 s	9	16.3″	15	45.27 s	6	22.1″	26	12.60 s	2	26.3″	33	43.88 s	9	55.0″	3
10	[9] 32.87	12	14.8	13	45.33	10	19.5	28	12.62	8	23.0	36	43.97	15	54.7	4
20	32.99	16	13.5	13	[10] 45.43	14	16.7	25	[10] 12.70	14	19.4	32	[11] 44.12	17	54.3	5
30	33.15	18	12.2	11	45.57	18	14.2	23	12.84	20	16.2	30	44.29	20	53.8	5
Febr. 9	33.33	21	11.1	9	45.75	20	11.9	20	13.04	25	13.2	27	44.49	23	53.3	5
19	33.54	23	10.2	7	45.95	24	9.9	16	13.29	30	10.5	21	44.72	26	52.8	6
März 1	33.77	25	9.5	3	46.19	26	8.3	11	13.59	34	8.4	17	44.98	27	52.2	6
11	34.02	27	9.2	1	46.45	28	7.2	7	13.93	36	6.7	11	45.25	29	51.6	7
21	34.29	28	9.1	3	46.73	29	6.5	1	14.29	39	5.6	5	45.54	31	50.9	8
31	34.57	28	9.4	6	47.02	31	6.4	4	14.68	40	5.1	0	45.85	31	50.1	8
April 10	34.85	29	10.0	9	47.33	31	6.8	9	15.08	40	5.1	8	46.16	32	49.3	9
20	35.14	28	10.9	12	47.64	30	7.7	13	15.48	39	5.9	13	46.48	32	48.4	8
30	35.42	28	12.1	14	47.94	29	9.0	18	15.87	38	7.2	19	46.80	31	47.6	8
Mai 10	35.70	26	13.5	16	48.23	28	10.8	22	16.25	35	9.1	24	47.11	31	46.8	8
20	35.96	25	15.1	17	48.51	26	13.0	24	16.60	31	11.5	28	47.42	29	46.0	6
30	36.21	22	16.8	18	48.77	23	15.4	26	16.91	27	14.3	31	47.71	26	45.4	6
Juni 9	36.43	20	18.6	18	49.00	19	18.0	28	17.18	21	17.4	33	47.97	23	44.8	4
19	36.63	16	20.4	18	49.19	15	20.8	29	17.39	16	20.7	34	48.20	20	44.4	2
29	36.79	12	22.2	16	49.34	11	23.7	28	17.55	10	24.1	34	48.40	15	44.2	1
Juli 9	36.91	8	23.8	16	49.45	7	26.5	27	17.65	4	27.5	34	48.55	11	44.1	0
19	36.99	3	25.4	14	49.52	2	29.2	26	17.69	3	30.9	33	48.66	6	44.1	2
29	37.02	0	26.8	12	49.54	3	31.8	24	17.66	10	34.2	30	48.72	1	44.3	3
Aug. 8	37.02	5	28.0	11	49.51	8	34.2	21	17.56	15	37.2	28	48.73	4	44.6	3
18	36.97	9	29.1	8	49.43	11	36.3	18	17.41	20	40.0	25	48.69	8	44.9	4
28	36.88	12	29.9	6	49.32	16	38.1	15	17.21	26	42.5	21	48.61	12	45.3	5
Sept. 7	36.76	15	30.5	5	49.16	18	39.6	12	16.95	29	44.6	17	48.49	15	45.8	5
17	36.61	17	31.0	2	48.98	20	40.8	8	16.66	31	46.3	13	48.34	18	46.3	4
27	36.44	18	31.2	1	48.78	22	41.6	4	16.35	34	47.6	7	48.16	19	46.7	3
Oct. 7	36.26	18	31.3	2	48.56	21	42.0	0	16.01	34	48.3	2	47.97	19	47.0	3
17	36.08	17	31.1	3	48.35	21	42.0	4	15.67	33	48.5	3	47.78	19	47.3	2
27	35.91	15	30.8	6	48.14	20	41.6	8	15.34	32	48.2	8	47.59	16	47.5	1
Nov. 6	35.76	13	30.2	7	47.94	17	40.8	12	15.02	29	47.4	13	47.43	14	47.6	0
16	35.63	10	29.5	10	47.77	14	39.6	15	14.73	25	46.1	19	47.29	11	47.6	1
26	35.53	6	28.5	11	47.63	10	38.1	19	14.48	20	44.2	22	47.18	6	47.5	2
Dec. 6	35.47	1	27.4	12	47.53	6	36.2	22	14.28	15	42.0	27	47.12	2	47.3	3
16	35.46	2	26.2	13	47.47	1	34.0	24	14.13	9	39.3	30	47.10	2	47.0	2
26	35.48	6	24.9	14	47.46	3	31.6	26	14.04	3	36.3	33	47.12	7	46.8	3
36	35.54		23.5		47.49		29.0		14.01		33.0		47.19		46.5	
Mittl. Ort	33.41		8.7		46.11		12.3		14.15		14.6		44.58		60.5	
	274)				275)				276)				605)			

1902	ϑ Cygni. 4ᵐ.6. AR.		Decl. +		γ Aquilae. 3ᵐ.0. AR.		Decl. +		δ Cygni. 2ᵐ.8. AR.		Decl. +		δ Sagittae. 4ᵐ.0. AR.		Decl. +	
	19ʰ 33ᵐ		49° 59′		19ʰ 41ᵐ		10° 22′		19ʰ 41ᵐ		44° 53′		19ʰ 43ᵐ		18° 17′	
Jan. 0	47.37	0	49.9	31	35.38	6	35.8	17	53.56	1	40.6	31	0.35	5	42.4	21
10	47.37	8	46.8	36	35.44	10	34.1	19	53.57	7	37.5	34	0.40	9	40.3	23
20	[12] 47.45	13	43.2	32	[14] 35.54	13	32.2	17	[14] 53.64	12	34.1	31	[14] 0.49	13	38.0	20
30	47.58	19	40.0	30	35.67	16	30.5	15	53.76	17	31.0	29	0.62	16	36.0	19
Febr. 9	47.77	24	37.0	27	35.83	19	29.0	12	53.93	21	28.1	25	0.78	19	34.1	16
19	48.01	28	34.3	22	36.02	22	27.8	9	54.14	26	25.6	22	0.97	21	32.5	13
März 1	48.29	32	32.1	17	36.24	23	26.9	6	54.40	29	23.4	17	1.18	24	31.2	9
11	48.61	35	30.4	11	36.47	26	26.3	3	54.69	32	21.7	11	1.42	26	30.3	5
21	48.96	38	29.3	6	36.73	27	26.0	1	55.01	34	20.6	6	1.68	27	29.8	0
31	49.34	39	28.7	1	37.00	28	26.1	5	55.35	36	20.0	1	1.95	29	29.8	4
April 10	49.73	39	28.8	7	37.28	29	26.6	9	55.71	36	20.1	7	2.24	30	30.2	9
20	50.12	39	29.5	13	37.57	29	27.5	13	56.07	36	20.8	12	2.54	29	31.1	12
30	50.51	37	30.8	19	37.86	28	28.8	15	56.43	35	22.0	18	2.83	29	32.3	16
Mai 10	50.88	34	32.7	23	38.14	28	30.3	18	56.78	33	23.8	22	3.12	28	33.9	20
20	51.22	31	35.0	27	38.42	26	32.1	20	57.11	30	26.0	26	3.40	26	35.9	22
30	51.53	27	37.7	30	38.68	23	34.1	21	57.41	27	28.6	30	3.66	24	38.1	23
Juni 9	51.80	22	40.7	33	38.91	21	36.2	21	57.68	22	31.6	31	3.90	21	40.4	25
19	52.02	17	44.0	34	39.12	17	38.3	22	57.90	18	34.7	33	4.11	17	42.9	25
29	52.19	11	47.4	34	39.29	14	40.5	21	58.08	12	38.0	34	4.28	13	45.4	24
Juli 9	52.30	5	50.8	34	39.43	9	42.6	20	58.20	6	41.4	33	4.41	8	47.8	24
19	52.35	2	54.2	33	39.52	5	44.6	18	58.26	1	44.7	32	4.49	5	50.2	22
29	52.33	8	57.5	31	39.57	0	46.4	17	58.27	5	47.9	30	4.54	0	52.4	21
Aug. 8	52.25	13	60.6	28	39.57	3	48.1	14	58.22	10	50.9	28	4.54	5	54.5	18
18	52.12	19	63.4	25	39.54	8	49.5	12	58.12	15	53.7	24	4.49	9	56.3	16
28	51.93	23	65.9	21	39.46	12	50.7	10	57.97	20	56.1	21	4.40	12	57.9	13
Sept. 7	51.70	28	68.0	18	39.34	14	51.7	8	57.77	23	58.2	17	4.28	15	59.2	10
17	51.42	30	69.8	13	39.20	17	52.5	4	57.54	27	59.9	13	4.13	18	60.2	7
27	51.12	32	71.1	8	39.03	18	52.9	2	57.27	28	61.2	9	3.95	19	60.9	4
Oct. 7	50.80	32	71.9	3	38.85	18	53.1	0	56.99	29	62.1	3	3.76	19	61.3	0
17	50.48	32	72.2	2	38.67	18	53.1	3	56.70	28	62.4	2	3.57	19	61.3	3
27	50.16	31	72.0	8	38.49	16	52.8	6	56.42	27	62.2	7	3.38	17	61.0	6
Nov. 6	49.85	28	71.2	12	38.33	15	52.2	9	56.15	25	61.5	11	3.21	16	60.4	10
16	49.57	24	70.0	18	38.18	11	51.3	10	55.90	21	60.4	17	3.05	12	59.4	12
26	49.33	20	68.2	22	38.07	8	50.3	13	55.69	17	58.7	21	2.93	9	58.2	16
Dec. 6	49.13	15	66.0	26	37.99	4	49.0	15	55.52	13	56.6	24	2.84	6	56.6	18
16	48.98	9	63.4	29	37.95	1	47.5	16	55.39	8	54.2	28	2.78	2	54.8	19
26	48.89	3	60.5	32	37.94	4	45.9	17	55.31	2	51.4	30	2.76	3	52.9	21
36	48.86		57.3		37.98		44.2		55.29		48.4		2.79		50.8	
Mittl. Ort	48.80		37.9		36.00		27.1		54.75		28.5		1.02		32.9	
	498)				277)				278)				279)			

1902	α Aquilae. $1^m.3$. AR.		Decl. +		ε Draconis. $3^m.8$. AR.		Decl. +		β Aquilae. $4^m.0$. AR.		Decl. +		ψ Cygni. $5^m.2$. AR.		Decl. +	
	$19^h 45^m$		8° 36′		$19^h 48^m$		70° 0′		$19^h 50^m$		6° 9′		$19^h 53^m$		52° 10′	
Jan. 0	59.49	5	41.6	16	27.16	14	80.2	33	29.34	5	50.6	15	4.33	3	55.8	31
10	59.54	10	40.0	18	27.02	2	76.9	37	29.39	10	49.1	16	4.30	— 4	52.7	36
20	[15] 59.64	13	38.2	15	[15] 27.00	— 11	73.2	35	[16] 29.49	12	47.5	14	[16] 4.34	10	49.1	32
30	59.77	16	36.7	13	27.11	23	69.7	32	29.61	16	46.1	12	4.44	16	45.9	31
Febr. 9	59.93	19	35.4	11	27.34	33	66.5	30	29.77	18	44.9	11	4.60	22	42.8	28
19	60.12	21	34.3	9	27.67	44	63.5	26	29.95	21	43.8	8	4.82	27	40.0	24
März 1	60.33	23	33.4	6	28.11	52	60.9	22	30.16	23	43.0	4	5.09	32	37.6	19
11	60.56	26	32.8	2	28.63	59	58.7	16	30.39	25	42.6	2	5.41	35	35.7	14
21	60.82	27	32.6	— 2	29.22	64	57.1	9	30.64	26	42.4	— 2	5.76	38	34.3	8
31	61.09	28	32.8	5	29.86	67	56.2	3	30.90	28	42.6	6	6.14	40	33.5	1
April 10	61.37	28	33.3	9	30.53	68	55.9	— 3	31.18	29	43.2	9	6.54	41	33.4	— 5
20	61.65	29	34.2	13	31.21	67	56.2	10	31.47	28	44.1	12	6.95	40	33.9	10
30	61.94	29	35.5	15	31.88	64	57.2	15	31.75	29	45.3	14	7.35	40	34.9	17
Mai 10	62.23	28	37.0	18	32.52	59	58.7	21	32.04	28	46.7	17	7.75	38	36.6	22
20	62.51	26	38.8	19	33.11	52	60.8	26	32.32	27	48.4	18	8.13	34	38.8	26
30	62.77	24	40.7	20	33.63	43	63.4	30	32.59	24	50.2	20	8.47	30	41.4	29
Juni 9	63.01	21	42.7	21	34.06	35	66.4	32	32.83	21	52.2	20	8.77	25	44.3	32
19	63.22	18	44.8	21	34.41	25	69.6	34	33.04	18	54.2	19	9.02	20	47.5	34
29	63.40	14	46.9	20	34.66	14	73.0	36	33.22	15	56.1	19	9.22	13	50.9	34
Juli 9	63.54	10	48.9	19	34.80	3	76.6	36	33.37	10	58.0	18	9.35	8	54.3	35
19	63.64	6	50.8	18	34.83	— 8	80.2	35	33.47	7	59.8	16	9.43	1	57.8	34
29	63.70	1	52.6	16	34.75	19	83.7	34	33.54	1	61.4	15	9.44	— 6	61.2	32
Aug. 8	63.71	— 3	54.2	14	34.56	29	87.1	32	33.55	— 2	62.9	13	9.38	12	64.4	30
18	63.68	7	55.6	12	34.27	39	90.3	29	33.53	7	64.2	10	9.26	18	67.4	27
28	63.61	11	56.8	9	33.88	47	93.2	26	33.46	11	65.2	8	9.08	23	70.1	24
Sept. 7	63.50	14	57.7	7	33.41	54	95.8	21	33.35	13	66.0	6	8.85	27	72.5	20
17	63.36	16	58.4	5	32.87	60	97.9	17	33.22	16	66.6	4	8.58	30	74.5	15
27	63.20	18	58.9	2	32.27	64	99.6	13	33.06	17	67.0	1	8.28	33	76.0	11
Oct. 7	63.02	18	59.1	— 1	31.63	66	100.9	8	32.89	18	67.1	0	7.95	34	77.1	6
17	62.84	17	59.0	3	30.97	67	101.7	1	32.71	18	67.1	3	7.61	33	77.7	0
27	62.67	17	58.7	5	30.30	65	101.8	— 4	32.53	16	66.8	6	7.28	33	77.7	5
Nov. 6	62.50	14	58.2	8	29.65	62	101.4	9	32.37	14	66.2	7	6.95	31	77.2	10
16	62.36	11	57.4	10	29.03	56	100.5	15	32.23	11	65.5	10	6.64	27	76.2	16
26	62.25	8	56.4	12	28.47	50	99.0	20	32.12	8	64.5	11	6.37	23	74.6	20
Dec. 6	62.17	4	55.2	14	27.97	41	97.0	25	32.04	5	63.4	13	6.14	18	72.6	24
16	62.13	1	53.8	15	27.56	31	94.5	29	31.99	1	62.1	14	5.96	12	70.2	28
26	62.12	— 3	52.3	16	27.25	21	91.6	33	31.98	— 3	60.7	15	5.84	7	67.4	31
36	62.15		50.7		27.04		88.3		32.01		59.2		5.77		64.3	
Mittl. Ort	60.09		33.1		30.35		65.7		29.92		42.3		5.75		42.3	
	280)				282)				283)				285)			

1902	γ Sagittae. 3m.6. AR.	Δ	Decl. +	Δ	ϑ Aquilae. 3m.0. AR.	Δ	Decl. −	Δ	o1 seq. Cygni. 4m.5. AR.	Δ	Decl. +	Δ	κ Cephei. 4m.3. AR.	Δ	Decl. +	Δ
	19h 54m		19° 13′		20h 6m		1° 6′		20h 10m		46° 26′		20h 12m		77° 24′	
Jan. 0	23.25		43.0		14.32		37.3		31.66		52.0		6.78		75.6	
10	23.29	4	40.9	21	14.36	4	38.4	11	31.63	3	49.0	30	6.40	38	72.5	31
20	^{17}23.37	8	38.5	24	^{19}14.45	9	39.5	11	31.65	— 2	46.0	30	6.21	19	69.2	33
30	23.48	11	36.5	20	14.56	11	40.4	9	^{20}31.74	9	42.6	34	^{21}6.21	0	65.5	37
Febr. 9	23.63	15	34.6	19	14.70	14	41.2	8	31.87	13	39.6	30	6.41	20	62.2	33
19	23.81	18	32.9	17	14.87	17	41.8	6	32.05	18	36.9	27	6.80	39	59.0	32
März 1	24.01	20	31.6	13	15.07	20	42.2	4	32.28	23	34.5	24	7.36	56	56.2	28
11	24.24	23	30.6	10	15.29	22	42.3	1	32.55	27	32.6	19	8.07	71	53.8	24
21	24.50	26	30.1	5	15.53	24	42.2	— 1	32.85	30	31.2	14	8.91	84	51.9	19
31	24.77	27	30.0	1	15.79	26	41.8	4	33.19	34	30.4	8	9.84	93	50.6	13
April 10	25.05	28	30.3	— 3	16.07	28	41.1	7	33.55	36	30.2	2	10.84	100	49.9	7
20	25.35	30	31.1	8	16.35	28	40.1	10	33.92	37	30.6	— 4	11.87	103	49.9	0
30	25.65	30	32.4	13	16.64	29	38.9	12	34.29	37	31.6	10	12.89	102	50.4	5
Mai 10	25.94	29	34.0	16	16.93	29	37.5	14	34.66	37	33.1	15	13.88	99	51.6	12
20	26.22	28	35.9	19	17.22	29	36.0	15	35.02	36	35.1	20	14.80	92	53.4	18
30	26.49	27	38.1	22	17.49	27	34.3	17	35.35	33	37.5	24	15.63	83	55.6	22
Juni 9	26.74	25	40.4	23	17.75	26	32.6	17	35.65	30	40.3	28	16.34	71	58.3	27
19	26.96	22	42.9	25	17.98	23	30.9	17	35.91	26	43.4	31	16.92	58	61.3	30
29	27.14	18	45.5	26	18.18	20	29.2	17	36.12	21	46.7	33	17.34	42	64.6	33
Juli 9	27.28	14	48.0	25	18.34	16	27.6	16	36.28	16	50.0	33	17.60	26	68.1	35
19	27.38	10	50.4	24	18.47	13	26.2	14	36.38	10	53.4	34	17.69	9	71.7	36
29	27.43	5	52.7	23	18.55	8	24.9	13	36.43	5	56.7	33	17.61	— 8	75.3	36
Aug. 8	27.44	1	54.8	21	18.58	3	23.8	11	36.41	— 2	59.9	32	17.37	24	78.8	35
18	27.41	— 3	56.8	20	18.57	— 1	22.9	9	36.34	7	62.9	30	16.96	41	82.1	33
28	27.33	8	58.4	16	18.52	5	22.1	8	36.21	13	65.6	27	16.41	55	85.2	31
Sept. 7	27.21	12	59.8	14	18.43	9	21.6	5	36.04	17	68.0	24	15.72	69	88.1	29
17	27.07	14	60.9	11	18.31	12	21.2	4	35.82	22	70.0	20	14.91	81	90.6	25
27	26.90	17	61.7	8	18.17	14	21.0	2	35.57	25	71.6	16	14.00	91	92.7	21
Oct. 7	26.71	19	62.1	4	18.00	17	21.0	0	35.30	27	72.8	12	13.02	98	94.4	17
17	26.52	19	62.2	1	17.83	17	21.1	1	35.02	28	73.5	7	11.98	104	95.6	12
27	26.33	19	62.0	— 2	17.66	17	21.4	3	34.73	29	73.7	2	10.92	106	96.2	6
Nov. 6	26.15	18	61.5	5	17.50	16	21.9	5	34.45	28	73.4	— 3	9.86	106	96.3	1
16	25.99	16	60.6	9	17.36	14	22.5	6	34.18	27	72.5	9	8.83	103	95.8	— 5
26	25.86	13	59.4	12	17.24	12	23.2	7	33.94	24	71.2	13	7.85	98	94.7	11
Dec. 6	25.76	10	57.9	15	17.16	8	24.0	8	33.74	20	69.4	18	6.96	89	93.0	17
16	25.69	7	56.1	18	17.11	5	24.9	9	33.58	16	67.2	22	6.19	77	90.9	21
26	25.66	3	54.2	19	17.09	2	26.0	11	33.47	11	64.6	26	5.56	63	88.3	26
36	25.68	— 2	52.1	21	17.11	— 2	27.0	10	33.40	7	61.7	29	5.08	48	85.4	29
Mittl. Ort	23.90		33.0		14.85		44.7		32.74		38.0		11.68		58.7	
	286)				287)				288)				502)			

1902	24 Vulpecul. 5^m.8.				α^2 Capricorni. 3^m.3.				γ Cygni. 2^m.4.				ϑ Cephei. 4^m.0.			
	AR.		Decl. +		AR.		Decl. −		AR.		Decl. +		AR.		Decl. +	
	20^h 12^m		24° 22′		20^h 12^m		12° 50′		20^h 18^m		39° 56′		20^h 27^m		62° 39′	
Jan. 0	34.82^s		18.6″		36.48^s		50.2″		41.83^s		48.2″		54.47^s		68.9″	
10	34.84	2	16.4	22	36.52	4	50.5	3	41.81	2	45.4	28	54.32	15	65.9	30
20	34.89	5	14.1	23	36.60	8	50.8	3	41.83	2	42.6	28	54.26	6	62.6	33
30	^{21}34.98	9	11.6	25	^{21}36.72	12	51.0	2	^{22}41.91	8	39.4	32	^{25}54.28	2	58.9	37
Febr. 9	35.11	13	9.4	22	36.87	15	51.1	1	42.03	12	36.6	28	54.39	11	55.6	33
19	35.27	16	7.5	19	37.04	17	51.0	1	42.19	16	34.1	25	54.59	20	52.5	31
März 1	35.47	20	5.9	16	37.24	20	50.8	2	42.39	20	31.9	22	54.86	27	49.7	28
11	35.69	22	4.7	12	37.47	23	50.4	4	42.64	25	30.1	18	55.21	35	47.3	24
21	35.94	25	3.9	8	37.72	25	49.8	6	42.92	28	28.8	13	55.61	40	45.4	19
31	36.21	27	3.6	3	37.98	26	49.1	7	43.22	30	28.1	7	56.07	46	44.1	13
April 10	36.49	28	3.8	2	38.26	28	48.2	9	43.54	32	28.0	1	56.57	50	43.4	7
20	36.79	30	4.5	7	38.56	30	47.1	11	43.88	34	28.4	4	57.09	52	43.4	0
30	37.10	31	5.6	11	38.86	30	45.9	12	44.23	35	29.3	9	57.61	52	44.0	6
Mai 10	37.40	30	7.2	16	39.16	30	44.6	13	44.58	35	30.8	15	58.13	52	45.2	12
20	37.70	30	9.1	19	39.46	30	43.3	13	44.91	33	32.8	20	58.63	50	46.9	17
30	37.98	28	11.3	22	39.74	28	41.9	14	45.22	31	35.1	23	59.10	47	49.2	23
Juni 9	38.24	26	13.8	25	40.01	27	40.6	13	45.51	29	37.8	27	59.51	41	51.9	27
19	38.48	24	16.4	26	40.26	25	39.4	12	45.77	26	40.8	30	59.87	36	55.0	31
29	38.68	20	19.1	27	40.47	21	38.3	11	45.98	21	43.9	31	60.16	29	58.3	33
Juli 9	38.83	15	21.8	27	40.65	18	37.4	9	46.14	16	47.1	32	60.37	21	61.7	34
19	38.95	12	24.5	27	40.79	14	36.6	8	46.26	12	50.3	32	60.50	13	65.3	36
29	39.02	7	27.1	26	40.88	9	36.0	6	46.33	7	53.5	32	60.55	5	68.9	36
Aug. 8	39.04	2	29.5	24	40.93	5	35.5	5	46.34	1	56.5	30	60.52	3	72.5	36
18	39.02	2	31.7	22	40.93	0	35.2	3	46.29	5	59.3	28	60.40	12	75.9	34
28	38.95	7	33.7	20	40.89	4	35.1	1	46.19	10	61.9	26	60.20	20	79.0	31
Sept. 7	38.84	11	35.4	17	40.81	8	35.1	0	46.05	14	64.2	23	59.94	26	81.9	29
17	38.69	15	36.7	13	40.69	12	35.2	1	45.88	17	66.1	19	59.61	33	84.4	25
27	38.52	17	37.8	11	40.54	15	35.4	2	45.67	21	67.6	15	59.23	38	86.6	22
Oct. 7	38.34	18	38.5	7	40.38	16	35.7	3	45.43	24	68.7	11	58.81	42	88.3	17
17	38.14	20	38.8	3	40.21	17	36.0	3	45.18	25	69.4	7	58.37	44	89.4	11
27	37.94	20	38.7	1	40.04	17	36.4	4	44.93	25	69.6	2	57.91	46	90.1	7
Nov. 6	37.75	19	38.3	4	39.88	16	36.8	4	44.69	24	69.3	3	57.45	46	90.2	1
16	37.57	18	37.5	8	39.73	15	37.2	4	44.46	23	68.6	7	57.00	45	89.8	4
26	37.42	15	36.3	12	39.61	12	37.6	4	44.26	20	67.4	12	56.58	42	88.7	11
Dec. 6	37.30	12	34.8	15	39.53	8	38.0	4	44.08	18	65.7	17	56.20	38	87.1	16
16	37.22	8	33.0	18	39.48	5	38.4	4	43.95	13	63.6	21	55.88	32	85.0	21
26	37.17	5	31.0	20	39.46	2	38.8	4	43.85	10	61.2	24	55.62	26	82.5	25
36	37.15	2	28.7	23	39.48	2	39.1	3	43.80	5	58.5	27	55.42	20	79.6	29
Mittl. Ort	35.46		7.4		37.04		55.9		42.68		34.5		56.26		52.0	
	501)				607)				289)				291)			

1902	ε Delphini 4m.0. AR.		ε Delphini Decl. +		73 Draconis. 5m.3. AR.		73 Draconis Decl. +		β Delphini. 3m.3. AR.		β Delphini Decl. +		υ Capricorni. 5m.6. AR.		υ Capricorni Decl. −	
	20h 28m		10° 58′		20h 32m		74° 36′		20h 32m		14° 15′		20h 34m		18° 28′	
Jan. 0	31.35	1	21.0	16	44.85	36	85.8	29	56.67	1	24.3	17	27.75	2	57.3	0
10	31.36	5	19.4	16	44.49	21	82.9	32	56.68	4	22.6	18	27.77	6	57.3	1
20	31.41	9	17.8	17	44.28	5	79.7	37	56.72	8	20.8	19	27.83	10	57.2	2
30	25 31.50	11	16.1	14	26 44.23	—11	76.0	34	26 56.80	11	18.9	16	26 27.93	13	57.0	4
Febr. 9	31.61	15	14.7	12	44.34	26	72.6	32	56.91	14	17.3	14	28.06	16	56.6	4
19	31.76	18	13.5	10	44.60	41	69.4	29	57.05	17	15.9	12	28.22	19	56.2	6
März 1	31.94	20	12.5	7	45.01	54	66.5	26	57.22	20	14.7	8	28.41	21	55.6	8
11	32.14	23	11.8	4	45.55	65	63.9	21	57.42	23	13.9	5	28.62	24	54.8	9
21	32.37	25	11.4	—1	46.20	74	61.8	15	57.65	25	13.4	0	28.86	26	53.9	10
31	32.62	27	11.5	4	46.94	81	60.3	9	57.90	27	13.4	3	29.12	28	52.9	11
April 10	32.89	28	11.9	8	47.75	85	59.4	3	58.17	28	13.7	8	29.40	29	51.8	13
20	33.17	29	12.7	12	48.60	86	59.1	—3	58.45	29	14.5	11	29.69	31	50.5	13
30	33.46	29	13.9	15	49.46	85	59.4	10	58.74	30	15.6	15	30.00	31	49.2	13
Mai 10	33.75	30	15.4	17	50.31	81	60.4	15	59.04	29	17.1	17	30.31	31	47.9	13
20	34.05	28	17.1	20	51.12	74	61.9	21	59.33	29	18.8	20	30.62	30	46.6	13
30	34.33	27	19.1	21	51.86	65	64.0	25	59.62	27	20.8	22	30.92	29	45.3	12
Juni 9	34.60	24	21.2	22	52.51	55	66.5	29	59.89	24	23.0	23	31.21	26	44.1	10
19	34.84	21	23.4	22	53.06	44	69.4	32	60.13	22	25.3	24	31.47	24	43.1	9
29	35.05	17	25.6	22	53.50	30	72.6	35	60.35	18	27.7	23	31.71	21	42.2	8
Juli 9	35.22	14	27.8	21	53.80	17	76.1	36	60.53	14	30.0	23	31.92	16	41.4	5
19	35.36	9	29.9	20	53.97	3	79.7	36	60.67	9	32.3	22	32.08	12	40.9	4
29	35.45	5	31.9	18	54.00	—11	83.3	36	60.76	5	34.5	20	32.20	7	40.5	1
Aug. 8	35.50	1	33.7	17	53.89	24	86.9	35	60.81	1	36.5	18	32.27	2	40.4	0
18	35.51	—4	35.4	14	53.65	38	90.4	33	60.82	—4	38.3	16	32.29	—2	40.4	2
28	35.47	8	36.8	11	53.27	49	93.7	31	60.78	8	39.9	13	32.27	7	40.6	3
Sept. 7	35.39	11	37.9	9	52.78	60	96.8	27	60.70	11	41.2	10	32.20	10	40.9	4
17	35.28	14	38.8	7	52.18	68	99.5	24	60.59	14	42.2	8	32.10	13	41.3	4
27	35.14	16	39.5	4	51.50	76	101.9	19	60.45	16	43.0	6	31.97	16	41.7	5
Oct. 7	34.98	17	39.9	1	50.74	81	103.8	14	60.29	17	43.6	2	31.81	17	42.2	5
17	34.81	18	40.0	—1	49.93	84	105.2	9	60.12	18	43.8	—1	31.64	17	42.7	4
27	34.63	17	39.9	4	49.09	85	106.1	4	59.94	17	43.7	3	31.47	17	43.1	4
Nov. 6	34.46	15	39.5	6	48.24	83	106.5	—3	59.77	16	43.4	7	31.30	15	43.5	4
16	34.31	13	38.9	9	47.41	80	106.2	8	59.61	14	42.7	9	31.15	13	43.9	3
26	34.18	11	38.0	12	46.61	74	105.4	14	59.47	11	41.8	12	31.02	11	44.2	3
Dec. 6	34.07	8	36.8	13	45.87	66	104.0	19	59.36	8	40.6	14	30.91	7	44.5	2
16	33.99	4	35.5	15	45.21	55	102.1	24	59.28	5	39.2	16	30.84	3	44.7	1
26	33.95	1	34.0	15	44.66	43	99.7	28	59.23	2	37.6	17	30.81	0	44.8	0
36	33.94		32.5		44.23		96.9		59.21		35.9		30.81		44.8	
Mittl. Ort	31.84		11.6		48.35		67.6		57.16		14.3		28.30		61.7	
	290)				504)				292)				610)			

1902	α Delphini. $3^m.6$. AR.		α Delphini. Decl. +		α Cygni. $1^m.6$. AR.		α Cygni. Decl. +		ε Cygni. $2^m.6$. AR.		ε Cygni. Decl. +		ε Aquarii. $3^m.6$. AR.		ε Aquarii. Decl. —	
	$20^h\ 35^m$		$15°\ 33'$		$20^h\ 38^m$		$44°\ 55'$		$20^h\ 42^m$		$33°\ 36'$		$20^h\ 42^m$		$9°\ 50'$	
Jan. 0	4.66	0	68.1	18	4.61	6	63.1	28	14.14	4	24.3	24	21.78	2	71.8	4
10	4.66	3	66.3	18	4.55	2	60.3	29	14.10	—1	21.9	26	21.80	5	72.2	4
20	4.69	8	64.5	20	4.53	—5	57.4	33	14.11	6	19.3	28	21.85	9	72.6	3
30	^{26} 4.77	11	62.5	17	^{27} 4.58	10	54.1	29	^{28} 14.17	9	16.5	25	^{28} 21.94	11	72.9	2
Febr. 9	4.88	14	60.8	14	4.68	14	51.2	27	14.26	13	14.0	23	22.05	14	73.1	0
19	5.02	17	59.4	12	4.82	19	48.5	24	14.39	18	11.7	21	22.19	17	73.1	1
März 1	5.19	20	58.2	9	5.01	23	46.1	21	14.57	21	9.6	16	22.36	20	73.0	3
11	5.39	22	57.3	6	5.24	28	44.0	16	14.78	24	8.0	12	22.56	22	72.7	6
21	5.61	25	56.7	1	5.52	31	42.4	10	15.02	27	6.8	7	22.78	25	72.1	7
31	5.86	27	56.6	—3	5.83	34	41.4	4	15.29	30	6.1	2	23.03	26	71.4	10
April 10	6.13	29	56.9	7	6.17	36	41.0	—1	15.59	31	5.9	—3	23.29	29	70.4	12
20	6.42	29	57.6	11	6.53	37	41.1	8	15.90	33	6.2	9	23.58	29	69.2	13
30	6.71	30	58.7	15	6.90	37	41.9	12	16.23	33	7.1	13	23.87	30	67.9	14
Mai 10	7.01	29	60.2	18	7.27	36	43.1	18	16.56	32	8.4	18	24.17	30	66.5	15
20	7.30	29	62.0	20	7.63	34	44.9	23	16.88	31	10.2	22	24.47	29	65.0	15
30	7.59	27	64.0	22	7.97	32	47.2	26	17.19	30	12.4	26	24.76	29	63.5	15
Juni 9	7.86	25	66.2	24	8.29	29	49.8	29	17.49	27	15.0	28	25.05	26	62.0	15
19	8.11	21	68.6	24	8.58	24	52.7	32	17.76	23	17.8	29	25.31	23	60.5	13
29	8.32	18	71.0	24	8.82	19	55.9	33	17.99	19	20.7	30	25.54	20	59.2	13
Juli 9	8.50	14	73.4	24	9.01	14	59.2	33	18.18	14	23.7	30	25.74	16	57.9	10
19	8.64	10	75.8	22	9.15	9	62.5	33	18.32	10	26.7	30	25.90	12	56.9	9
29	8.74	6	78.0	20	9.24	3	65.8	33	18.42	5	29.7	29	26.02	7	56.0	7
Aug. 8	8.80	0	80.0	19	9.27	—3	69.1	31	18.47	—1	32.6	27	26.09	3	55.3	5
18	8.80	4	81.9	17	9.24	9	72.2	28	18.46	5	35.3	25	26.12	—1	54.8	3
28	8.76	7	83.6	14	9.15	13	75.0	26	18.41	10	37.8	22	26.11	6	54.5	1
Sept. 7	8.69	12	85.0	11	9.02	18	77.6	22	18.31	13	40.0	19	26.05	10	54.4	0
17	8.57	14	86.1	8	8.84	22	79.8	18	18.18	17	41.9	16	25.95	12	54.4	1
27	8.43	16	86.9	6	8.62	24	81.6	14	18.01	19	43.5	11	25.83	15	54.5	3
Oct. 7	8.27	17	87.5	3	8.38	26	83.0	10	17.82	21	44.6	8	25.68	16	54.8	3
17	8.10	18	87.8	—1	8.12	27	84.0	5	17.61	22	45.4	3	25.52	16	55.1	4
27	7.92	17	87.7	3	7.85	27	84.5	0	17.39	22	45.7	—1	25.36	16	55.5	4
Nov. 6	7.75	16	87.4	7	7.58	26	84.5	5	17.17	20	45.6	5	25.20	15	55.9	5
16	7.59	14	86.7	9	7.32	23	84.0	10	16.97	18	45.1	10	25.05	13	56.4	5
26	7.45	11	85.8	12	7.09	21	83.0	15	16.79	16	44.1	14	24.92	10	56.9	6
Dec. 6	7.34	9	84.6	14	6.88	18	81.5	20	16.63	13	42.7	18	24.82	8	57.5	5
16	7.25	6	83.2	16	6.70	13	79.5	23	16.50	10	40.9	21	24.74	4	58.0	6
26	7.19	2	81.6	18	6.57	9	77.2	27	16.40	5	38.8	23	24.70	0	58.6	5
36	7.17		79.8		6.48		74.5		16.35		36.5		24.70		59.1	
Mittl. Ort	5.14		57.8		5.46		47.8		14.75		10.7		22.26		77.4	
	293)				294)				298)				297)			

1902	η Cephei. $3^m.6$. AR.		Decl. +		λ Cygni. $4^m.6$. AR.		Decl. +		32 Vulpecul. $5^m.3$. AR.		Decl. +		ν Cygni. $4^m.0$. AR.		Decl. +	
	$20^h\ 43^m$		$61°\ 27'$		$20^h\ 43^m$		$36°\ 7'$		$20^h\ 50^m$		$27°\ 41'$		$20^h\ 53^m$		$40°\ 47'$	
Jan. 0	$16^s.30$		$46''.3$		$34^s.78$		$63''.9$		$22^s.49$		$17''.5$		$30^s.50$		$38''.5$	
10	16.14	16	43.5	28	34.74	4	61.4	25	22.46	3	15.2	23	30.44	6	35.9	26
20	16.05	9	40.3	32	34.74	0	58.7	27	22.46	0	12.9	23	30.42	2 —	33.2	27
30	[28] 16.04	1 —	36.7	36	[28] 34.79	5	55.8	29	22.50	4	10.6	23	30.44	2	30.3	29
Febr. 9	16.13	9	33.5	32	34.88	9	53.1	27	[30] 22.60	10	8.1	25	[31] 30.52	8	27.3	30
19	16.29	16	30.4	31	35.01	13	50.7	24	22.73	13	6.0	21	30.64	12	24.7	26
März 1	16.53	24	27.5	29	35.19	18	48.6	21	22.89	16	4.2	18	30.81	17	22.4	23
11	16.84	31	25.1	24	35.40	21	46.8	18	23.08	19	2.8	14	31.02	21	20.4	20
21	17.21	37	23.1	20	35.64	24	45.5	13	23.30	22	1.8	10	31.27	25	18.9	15
31	17.63	42	21.7	14	35.92	28	44.7	8	23.56	26	1.2	6	31.55	28	17.8	11
April 10	18.10	47	20.8	9	36.22	30	44.4	3 —	23.84	28	1.1	1 —	31.86	31	17.3	5 —
20	18.59	49	20.6	2 —	36.54	32	44.7	3	24.13	29	1.5	4	32.20	34	17.4	1
30	19.10	51	21.1	5	36.87	33	45.5	8	24.44	31	2.4	9	32.55	35	18.1	7
Mai 10	19.61	51	22.1	10	37.21	34	46.8	13	24.76	32	3.7	13	32.90	35	19.3	12
20	20.11	50	23.7	16	37.54	33	48.6	18	25.07	31	5.5	18	33.25	35	21.0	17
30	20.58	47	25.9	22	37.86	32	50.8	22	25.38	31	7.6	21	33.59	34	23.1	21
Juni 9	21.00	42	28.5	26	38.16	30	53.3	25	25.67	29	10.0	24	33.91	32	25.6	25
19	21.37	37	31.5	30	38.43	27	56.1	28	25.93	26	12.6	26	34.20	29	28.4	28
29	21.68	31	34.7	32	38.67	24	59.1	30	26.16	23	15.4	28	34.45	25	31.4	30
Juli 9	21.92	24	38.2	35	38.86	19	62.2	31	26.36	20	18.2	28	34.66	21	34.6	32
19	22.08	16	41.8	36	39.01	15	65.3	31	26.51	15	21.0	28	34.82	16	37.9	33
29	22.17	9	45.4	36	39.10	9	68.4	31	26.62	11	23.8	28	34.92	10	41.1	32
Aug. 8	22.17	0	49.0	36	39.15	5 —	71.4	30	26.68	6	26.5	27	34.97	5	44.3	32
18	22.09	8	52.5	35	39.14	1	74.2	28	26.69	1 —	29.0	25	34.97	0	47.3	30
28	21.94	15	55.8	33	39.08	6	76.7	25	26.66	3	31.2	22	34.92	5	50.0	27
Sept. 7	21.72	22	58.8	30	38.98	10	79.0	23	26.58	8	33.2	20	34.82	10	52.5	25
17	21.43	29	61.5	27	38.84	14	81.0	20	26.46	12	34.9	17	34.67	15	54.7	22
27	21.09	34	63.8	23	38.66	18	82.6	16	26.31	15	36.3	14	34.49	18	56.6	19
Oct. 7	20.71	38	65.7	19	38.46	20	83.9	13	26.14	17	37.4	11	34.28	21	58.1	15
17	20.30	41	67.1	14	38.24	22	84.7	8	25.95	19	38.0	6	34.05	23	59.1	10
27	19.87	43	68.0	9	38.02	22	85.1	4 —	25.76	19	38.3	3 —	33.81	24	59.7	6
Nov. 6	19.43	44	68.3	3 —	37.80	22	85.0	1	25.56	20	38.2	1	33.57	24	59.8	1 —
16	19.01	42	68.0	3	37.59	21	84.5	5	25.37	19	37.6	6	33.34	23	59.4	4
26	18.60	41	67.2	8	37.39	20	83.5	10	25.21	16	36.7	9	33.12	22	58.5	9
Dec. 6	18.23	37	65.8	14	37.22	17	82.1	14	25.06	15	35.5	12	32.92	20	57.2	13
16	17.91	32	63.9	19	37.08	14	80.3	18	24.94	12	33.9	16	32.76	16	55.4	18
26	17.64	27	61.6	23	36.97	11	78.2	21	24.86	8	32.0	19	32.63	13	53.3	21
36	17.44	20	58.8	28	36.91	6	75.8	24	24.81	5	29.8	22	32.54	9	50.8	25
Mittl. Ort	17.82		28.6		35.42		49.7		22.99		4.6		31.16		23.1	
	299)				506)				507)				300)			

1902	61 Cygni pr. 5ᵐ.7.*)				ν Aquarii. 4ᵐ.3.				Br. 2777. 5ᵐ.8.				ζ Cygni. 3ᵐ.0.			
	AR.		Decl. +		AR.		Decl. —		AR.		Decl. +		AR.		Decl. +	
	21ʰ 2ᵐ		38° 15′		21ʰ 4ᵐ		11° 45′		21ʰ 7ᵐ		77° 43′		21ʰ 8ᵐ		29° 49′	
Jan. 0	29ˢ.45	5	76″.3	24	14ˢ.95	0	62″.7	4	24ˢ.40	58	65″.0	26	45ˢ.44	5	42″.4	22
10	29.40	1	73.9	26	14.95	2	63.1	2	23.82	44	62.4	30	45.39	1	40.2	23
20	29.39	— 3	71.3	26	14.97	6	63.3	1	23.38	24	59.4	32	45.38	— 2	37.9	23
30	29.42	9	68.7	28	15.03	10	63.4	1	23.14	5	56.2	37	45.40	7	35.6	26
Febr. 9	[2] 29.51	13	65.9	24	[2] 15.13	12	63.5	— 2	[3] 23.09	— 16	52.5	33	[3] 45.47	10	33.0	22
19	29.64	17	63.5	21	15.25	15	63.3	3	23.25	35	49.2	31	45.57	14	30.8	19
März 1	29.81	21	61.4	18	15.40	18	63.0	5	23.60	53	46.1	28	45.71	18	28.9	16
11	30.02	25	59.6	13	15.58	21	62.5	7	24.13	69	43.3	24	45.89	21	27.3	12
21	30.27	29	58.3	9	15.79	23	61.8	9	24.82	83	40.9	20	46.10	25	26.1	7
31	30.56	31	57.4	3	16.02	26	60.9	11	25.65	93	38.9	14	46.35	27	25.4	3
April 10	30.87	33	57.1	— 2	16.28	27	59.8	12	26.58	101	37.5	8	46.62	29	25.1	— 2
20	31.20	35	57.3	8	16.55	29	58.6	14	27.59	105	36.7	1	46.91	32	25.3	8
30	31.55	35	58.1	13	16.84	30	57.2	15	28.64	106	36.6	— 4	47.23	32	26.1	12
Mai 10	31.90	35	59.4	18	17.14	31	55.7	16	29.70	103	37.0	11	47.55	32	27.3	16
20	32.25	34	61.2	23	17.45	31	54.1	16	30.73	97	38.1	16	47.87	32	28.9	20
30	32.59	33	63.5	26	17.76	29	52.5	15	31.70	89	39.7	22	48.19	30	30.9	24
Juni 9	32.92	29	66.1	28	18.05	27	51.0	15	32.59	78	41.9	25	48.49	28	33.3	26
19	33.21	26	68.9	31	18.32	25	49.5	13	33.37	65	44.4	30	48.77	25	35.9	28
29	33.47	22	72.0	32	18.57	22	48.2	12	34.02	50	47.4	32	49.02	22	38.7	28
Juli 9	33.69	18	75.2	32	18.79	19	47.0	10	34.52	35	50.6	35	49.24	17	41.5	29
19	33.87	12	78.4	33	18.98	14	46.0	8	34.87	17	54.1	36	49.41	12	44.4	29
29	33.99	6	81.7	32	19.12	9	45.2	6	35.04	1	57.7	37	49.53	8	47.3	28
Aug. 8	34.05	2	84.9	30	19.21	5	44.6	4	35.05	— 16	61.4	36	49.61	3	50.1	26
18	34.07	— 3	87.9	28	19.26	0	44.2	3	34.89	32	65.0	36	49.64	— 2	52.7	24
28	34.04	9	90.7	25	19.26	3	43.9	0	34.57	47	68.6	33	49.62	6	55.1	22
Sept. 7	33.95	12	93.2	22	19.23	8	43.9	1	34.10	62	71.9	31	49.56	10	57.3	19
17	33.83	16	95.4	19	19.15	11	44.0	2	33.48	74	75.0	28	49.46	14	59.2	16
27	33.67	19	97.3	14	19.04	13	44.2	4	32.74	85	77.8	24	49.32	16	60.8	12
Oct. 7	33.48	21	98.7	11	18.91	15	44.6	4	31.89	94	80.2	20	49.16	18	62.0	8
17	33.27	22	99.8	6	18.76	16	45.0	5	30.95	100	82.2	14	48.98	20	62.8	5
27	33.05	22	100.4	2	18.60	16	45.5	5	29.95	104	83.6	10	48.78	19	63.3	1
Nov. 6	32.83	21	100.6	— 3	18.44	15	46.0	5	28.91	105	84.6	3	48.59	19	63.4	— 4
16	32.62	19	100.3	8	18.29	14	46.5	5	27.86	103	84.9	— 2	48.40	18	63.0	8
26	32.43	18	99.5	12	18.15	11	47.0	5	26.83	98	84.7	8	48.22	16	62.2	11
Dec. 6	32.25	14	98.3	16	18.04	9	47.5	5	25.85	91	83.9	14	48.06	13	61.1	15
16	32.11	11	96.7	20	17.95	6	48.0	4	24.94	81	82.5	20	47.93	11	59.6	18
26	32.00	8	94.7	22	17.89	2	48.4	4	24.13	68	80.5	24	47.82	7	57.8	21
36	31.92		92.5		17.87		48.8		23.45		78.1		47.75		55.7	
Mittl. Ort	30.03		61.5		15.37		67.5		27.99		44.3		45.86		28.7	
	302)				611)				510)				303)			

*) Die jährliche Parallaxe ist bereits angebracht.

1902	α Equulei. 4ᵐ.0. AR.	Δ	Decl. +	Δ	α Cephei. 2ᵐ.6. AR.	Δ	Decl. +	Δ	ι Pegasi. 4ᵐ.3. AR.	Δ	Decl. +	Δ	ζ Capricorni. 4ᵐ.1. AR.	Δ	Decl. −	Δ
	21ʰ 10ᵐ		4° 50′		21ʰ 16ᵐ		62° 10′		21ʰ 17ᵐ		19° 23′		21ʰ 21ᵐ		22° 49′	
Jan. 0	55.14	1	41.3	12	13.30	22	31.5	25	32.88	3	17.9	18	3.93	2	68.9	3
10	55.13	— 1	40.1	12	13.08	15	29.0	30	32.85	1	16.1	19	3.91	— 1	68.6	4
20	55.14	4	38.9	11	12.93	7	26.0	31	32.84	— 2	14.2	18	3.92	5	68.2	5
30	55.18	8	37.8	11	12.86	— 2	22.9	36	32.86	7	12.4	20	3.97	8	67.7	8
Febr. 9	55.26	11	36.7	8	12.88	9	19.3	32	32.93	10	10.4	17	4.05	11	66.9	9
19	55.37	14	35.9	7	12.97	18	16.1	30	33.03	13	8.7	14	4.16	15	66.0	10
März 1	55.51	16	35.2	4	13.15	26	13.1	27	33.16	16	7.3	11	4.31	17	65.0	11
11	55.67	20	34.8	0	13.41	33	10.4	22	33.32	19	6.2	8	4.48	21	63.9	13
21	55.87	22	34.8	2	13.74	39	8.2	18	33.51	23	5.4	4	4.69	23	62.6	14
31	56.09	25	35.0	6	14.13	45	6.4	12	33.74	25	5.0	— 1	4.92	26	61.2	15
April 10	56.34	27	35.6	8	14.58	49	5.2	6	33.99	27	5.1	5	5.18	28	59.7	16
20	56.61	28	36.4	12	15.07	51	4.6	0	34.26	29	5.6	9	5.46	30	58.1	16
30	56.89	29	37.6	15	15.58	53	4.6	6	34.55	31	6.5	13	5.76	31	56.5	16
Mai 10	57.18	30	39.1	16	16.11	52	5.2	12	34.86	30	7.8	16	6.07	32	54.9	15
20	57.48	29	40.7	19	16.63	50	6.4	18	35.16	31	9.4	20	6.39	33	53.4	15
30	57.77	29	42.6	20	17.13	47	8.2	22	35.47	29	11.4	22	6.72	31	51.9	13
Juni 9	58.06	27	44.6	20	17.60	43	10.4	27	35.76	28	13.6	24	7.03	30	50.6	11
19	58.33	24	46.6	20	18.03	37	13.1	31	36.04	25	16.0	25	7.33	28	49.5	9
29	58.57	22	48.6	19	18.40	31	16.2	33	36.29	22	18.5	25	7.61	25	48.6	7
Juli 9	58.79	18	50.5	19	18.71	23	19.5	35	36.51	18	21.0	25	7.86	20	47.9	5
19	58.97	13	52.4	18	18.94	15	23.0	36	36.69	13	23.5	25	8.06	17	47.4	3
29	59.10	9	54.2	16	19.09	7	26.6	36	36.82	9	26.0	23	8.23	12	47.1	0
Aug. 8	59.19	5	55.8	14	19.16	— 1	30.2	36	36.91	5	28.3	22	8.35	7	47.1	2
18	59.24	0	57.2	12	19.15	9	33.8	34	36.96	0	30.5	20	8.42	2	47.3	4
28	59.24	3	58.4	9	19.06	16	37.2	32	36.96	4	32.5	17	8.44	— 2	47.7	6
Sept. 7	59.21	8	59.3	7	18.90	23	40.4	30	36.92	8	34.2	14	8.42	7	48.3	7
17	59.13	10	60.0	5	18.67	29	43.4	27	36.84	11	35.6	12	8.35	11	49.0	8
27	59.03	13	60.5	3	18.38	35	46.1	22	36.73	14	36.8	9	8.24	13	49.8	8
Oct. 7	58.90	15	60.8	1	18.03	39	48.3	18	36.59	15	37.7	6	8.11	15	50.6	7
17	58.75	16	60.9	— 2	17.64	41	50.1	13	36.44	17	38.3	2	7.96	17	51.3	8
27	58.59	15	60.7	3	17.23	42	51.4	7	36.27	17	38.5	0	7.79	17	52.1	6
Nov. 6	58.44	15	60.4	5	16.81	43	52.1	2	36.10	17	38.5	4	7.62	16	52.7	5
16	58.29	14	59.9	7	16.38	42	52.3	— 4	35.93	15	38.1	7	7.46	14	53.2	4
26	58.15	12	59.2	9	15.96	39	51.9	10	35.78	14	37.4	10	7.32	13	53.6	3
Dec. 6	58.03	9	58.3	9	15.57	36	50.9	15	35.64	11	36.4	13	7.19	10	53.9	1
16	57.94	7	57.4	11	15.21	31	49.4	20	35.53	9	35.1	15	7.09	8	54.0	0
26	57.87	4	56.3	12	14.90	26	47.4	25	35.44	6	33.6	17	7.01	4	54.0	1
36	57.83		55.1		14.64		44.9		35.38		31.9		6.97		53.9	
Mittl. Ort	55.47		33.0		14.47		12.0		33.20		6.2		4.40		70.8	
			304)				306)				512)				612)	

1902	β Aquarii. $3^m.0$ AR.		β Aquarii. Decl. −		β Cephei. $3^m.0$ AR.		β Cephei. Decl. +		74 Cygni. $5^m.0$ AR.		74 Cygni. Decl. +		ε Pegasi. $2^m.3$ AR.		ε Pegasi. Decl. +	
	$21^h 26^m$		$5° 59'$		$21^h 27^m$		$70° 7'$		$21^h 33^m$		$39° 58'$		$21^h 39^m$		$9° 25'$	
Jan. 0	$23^s.69$		$63''.5$		$22^s.25$		$70''.2$		$0^s.85$		$38''.9$		$22^s.16$		$41''.2$	
10	23.66	3	64.1	6	21.89	36	67.7	25	0.75	10	36.6	23	22.11	5	40.0	12
20	23.67	1	64.7	6	21.61	28	64.8	29	0.69	6	34.1	25	22.09	2	38.7	13
30	23.70	3	65.2	5	21.44	17	61.7	31	0.67	2	31.5	26	22.10	1	37.4	13
Febr. 9	23.77	7	65.5	3	21.39	5	58.1	36	0.69	2	28.8	27	22.15	5	36.1	13
19	23.87	10	65.7	2	21.46	7	54.8	33	0.77	8	26.0	28	22.23	8	34.9	12
März 1	23.99	12	65.7	0	21.65	19	51.7	31	0.89	12	23.6	24	22.34	11	34.0	9
11	24.15	16	65.4	3	21.96	31	48.8	29	1.05	16	21.5	21	22.48	14	33.4	6
21	24.34	19	65.0	4	22.37	41	46.3	25	1.26	21	19.8	17	22.65	17	33.1	3
31	24.55	21	64.3	7	22.86	49	44.2	21	1.51	25	18.6	12	22.85	20	33.1	0
April 10	24.79	24	63.3	10	23.44	58	42.7	15	1.79	28	17.8	8	23.08	23	33.5	4
20	25.05	26	62.1	12	24.08	64	41.8	9	2.10	31	17.6	2	23.34	26	34.2	7
30	25.33	28	60.7	14	24.75	67	41.5	3	2.44	34	17.9	3	23.61	27	35.3	11
Mai 10	25.63	30	59.2	15	25.44	69	41.9	4	2.79	35	18.8	9	23.91	30	36.6	13
20	25.93	30	57.5	17	26.13	69	42.8	9	3.15	36	20.2	14	24.21	30	38.2	16
30	26.23	30	55.8	17	26.80	67	44.4	16	3.50	35	22.0	18	24.51	30	40.1	19
Juni 9	26.52	29	54.0	18	27.42	62	46.4	20	3.84	34	24.2	22	24.81	30	42.2	21
19	26.80	28	52.3	17	27.99	57	48.9	25	4.16	32	26.8	26	25.09	28	44.3	21
29	27.06	26	50.7	16	28.48	49	51.8	29	4.44	28	29.7	29	25.35	26	46.5	22
Juli 9	27.29	23	49.1	16	28.88	40	55.0	32	4.69	25	32.7	30	25.58	23	48.7	22
19	27.49	20	47.8	13	29.19	31	58.5	35	4.90	21	35.8	31	25.78	20	50.8	21
29	27.64	15	46.6	12	29.39	20	62.1	36	5.05	15	39.0	32	25.94	16	52.8	20
Aug. 8	27.76	12	45.6	10	29.49	10	65.8	37	5.16	11	42.2	32	26.06	12	54.7	19
18	27.83	7	44.8	8	29.48	1	69.4	36	5.21	5	45.3	31	26.13	7	56.4	17
28	27.85	2	44.2	6	29.36	12	73.0	36	5.21	0	48.2	29	26.16	3	57.9	15
Sept. 7	27.83	2	43.8	4	29.15	21	76.4	34	5.16	5	50.9	27	26.15	1	59.1	12
17	27.77	6	43.6	2	28.84	31	79.6	32	5.06	10	53.3	24	26.10	5	60.1	10
27	27.68	9	43.6	0	28.44	40	82.5	29	4.92	14	55.4	21	26.01	9	60.9	8
Oct. 7	27.56	12	43.7	1	27.97	47	85.0	25	4.75	17	57.1	17	25.90	11	61.5	6
17	27.42	14	44.0	3	27.44	53	87.1	21	4.56	19	58.5	14	25.77	13	61.8	3
27	27.27	15	44.4	4	26.87	57	88.7	16	4.34	22	59.4	9	25.62	15	61.8	0
Nov. 6	27.12	15	44.9	5	26.27	60	89.8	11	4.12	22	59.9	5	25.47	15	61.6	2
16	26.97	15	45.5	6	25.66	61	90.3	5	3.90	22	59.9	0	25.32	15	61.2	4
26	26.84	13	46.1	6	25.05	61	90.3	0	3.68	22	59.5	4	25.18	14	60.6	6
Dec. 6	26.72	12	46.7	6	24.47	58	89.6	7	3.48	20	58.6	9	25.05	13	59.8	8
16	26.62	10	47.4	7	23.92	55	88.3	13	3.30	18	57.2	14	24.94	11	58.8	10
26	26.55	7	48.0	6	23.43	49	86.5	18	3.15	15	55.4	18	24.85	9	57.6	12
36	26.51	4	48.7	7	23.01	42	84.2	23	3.03	12	53.3	21	24.79	6	56.4	12
Mittl. Ort	24.00		69.1		23.89		49.2		1.22		22.4		22.35		32.0	
	307)				308)				514)				309)			

1902	δ Capricorni. 3ᵐ.0. AR.	Δ	Decl. —	Δ	π² Cygni. 4ᵐ.3. AR.	Δ	Decl. +	Δ	16 Pegasi. 5ᵐ.3. AR.	Δ	Decl. +	Δ	α Aquarii. 3ᵐ.0. AR.	Δ	Decl. —	Δ
	21ʰ 41ᵐ		16° 33′		21ʰ 43ᵐ		48° 51′		21ʰ 48ᵐ		25° 27′		22ʰ 0ᵐ		0° 47′	
Jan. 0	37.63	4	77.6	1	9.94	15	39.4	24	35.99	8	63.2	18	44.87	6	39.6	8
10	37.59	1	77.7	0	9.79	10	37.0	26	35.91	4	61.4	20	44.81	2	40.4	8
20	37.58	2	77.7	2	9.69	6	34.4	28	35.87	1	59.4	20	44.79	0	41.2	7
30	37.60	5	77.5	3	9.63	0	31.6	29	35.86	2	57.4	21	44.79	2	41.9	6
Febr. 9	37.65	10	77.2	6	9.63	6	28.7	31	35.88	6	55.3	21	44.81	6	42.5	4
19	12 37.75	12	76.6	7	12 9.69	11	25.6	27	14 35.94	10	53.2	17	17 44.87	9	42.9	3
März 1	37.87	15	75.9	8	9.80	16	22.9	25	36.04	14	51.5	15	44.96	12	43.2	0
11	38.02	17	75.1	10	9.96	22	20.4	21	36.18	17	50.0	11	45.08	16	43.2	2
21	38.19	21	74.1	13	10.18	27	18.3	16	36.35	21	48.9	8	45.24	18	43.0	5
31	38.40	24	72.8	13	10.45	31	16.7	11	36.56	24	48.1	3	45.42	22	42.5	8
April 10	38.64	26	71.5	15	10.76	35	15.6	6	36.80	26	47.8	2	45.64	24	41.7	11
20	38.90	29	70.0	16	11.11	38	15.0	0	37.06	29	48.0	6	45.88	26	40.6	13
30	39.19	30	68.4	17	11.49	39	15.0	6	37.35	31	48.6	10	46.14	29	39.3	15
Mai 10	39.49	31	66.7	17	11.88	40	15.6	12	37.66	32	49.6	15	46.43	30	37.8	17
20	39.80	31	65.0	16	12.28	40	16.8	16	37.98	32	51.1	18	46.73	30	36.1	18
30	40.11	31	63.4	16	12.68	38	18.4	22	38.30	31	52.9	21	47.03	30	34.3	19
Juni 9	40.42	30	61.8	15	13.06	36	20.6	25	38.61	30	55.0	24	47.33	29	32.4	20
19	40.72	28	60.3	12	13.42	33	23.1	28	38.91	27	57.4	26	47.62	27	30.4	19
29	41.00	25	59.1	11	13.75	28	25.9	31	39.18	25	60.0	26	47.89	25	28.5	18
Juli 9	41.25	22	58.0	9	14.03	23	29.0	33	39.43	21	62.6	28	48.14	22	26.7	17
19	41.47	18	57.1	7	14.26	18	32.3	34	39.64	17	65.4	27	48.36	18	25.0	15
29	41.65	13	56.4	4	14.44	12	35.7	34	39.81	12	68.1	26	48.54	15	23.5	14
Aug. 8	41.78	9	56.0	2	14.56	6	39.1	34	39.93	8	70.7	25	48.69	10	22.1	11
18	41.87	4	55.8	1	14.62	0	42.5	32	40.01	3	73.2	23	48.79	5	21.0	9
28	41.91	0	55.9	2	14.62	6	45.7	30	40.04	1	75.5	21	48.84	1	20.1	7
Sept. 7	41.91	4	56.1	4	14.56	11	48.7	28	40.03	6	77.6	19	48.85	3	19.4	5
17	41.87	9	56.5	5	14.45	15	51.5	25	39.97	9	79.5	16	48.82	6	18.9	3
27	41.78	11	57.0	7	14.30	19	54.0	21	39.88	12	81.1	12	48.76	9	18.6	1
Oct. 7	41.67	14	57.7	6	14.11	23	56.1	18	39.76	15	82.3	10	48.67	12	18.5	1
17	41.53	15	58.3	7	13.88	25	57.9	13	39.61	16	83.3	6	48.55	13	18.6	3
27	41.38	15	59.0	7	13.63	27	59.2	8	39.45	17	83.9	2	48.42	14	18.9	4
Nov. 6	41.23	15	59.7	6	13.36	27	60.0	3	39.28	17	84.1	1	48.28	14	19.3	5
16	41.08	14	60.3	6	13.09	27	60.3	3	39.11	17	84.0	5	48.14	14	19.8	6
26	40.94	13	60.9	5	12.82	25	60.0	7	38.94	15	83.5	8	48.00	12	20.4	7
Dec. 6	40.81	11	61.4	3	12.57	23	59.3	13	38.79	14	82.7	12	47.88	11	21.1	8
16	40.70	8	61.7	3	12.34	21	58.0	17	38.65	12	81.5	14	47.77	9	21.9	8
26	40.62	5	62.0	2	12.13	17	56.3	22	38.53	9	80.1	17	47.68	7	22.7	8
36	40.57		62.2		11.96		54.1		38.44		78.4		47.61		23.5	
Mittl. Ort	37.96		80.3		10.36		20.9		36.15		49.8		45.00		45.9	
	615)				517)				518)				311)			

1902	ι Aquarii. 4ᵐ.0. AR.		Decl. −		20 Cephei. 5ᵐ.8. AR.		Decl. +		ϑ Pegasi. 3ᵐ.3. AR.		Decl. +		π Pegasi 4ᵐ.2. AR.		Decl. +	
	22ʰ 1ᵐ		14° 20′		22ʰ 2ᵐ		62° 18′		22ʰ 5ᵐ		5° 42′		22ʰ 5ᵐ		32° 41′	
Jan. 0	8.44ˢ		40.6″		1.16ˢ		48.1″		15.29ˢ		64.1″		37.97ˢ		65.8″	
		5		2		28		22		6		10		10		19
10	8.39		40.8		0.88		45.9		15.23		63.1		37.87		63.9	
		3		1		23		26		3		11		7		21
20	8.36		40.9	—	0.65		43.3		15.20		62.0		37.80		61.8	
		0		1		16		29		1		10		4		22
30	8.36		40.8		0.49		40.4		15.19	—	61.0		37.76		59.6	
		3		3		8		31		2		10		1		23
Febr. 9	8.39		40.5		0.41		37.3		15.21		60.0		37.75	—	57.3	
	17	7		4	17	0		34	18	6		9	18	4		25
19	8.46		40.1		0.41		33.9		15.27		59.1		37.79		54.8	
		9		6		9		31		8		7		8		21
März 1	8.55		39.5		0.50		30.8		15.35		58.4		37.87		52.7	
		13		8		17		29		11		4		12		18
11	8.68		38.7		0.67		27.9		15.46		58.0		37.99		50.9	
		15		9		26		25		15		1		16		15
21	8.83		37.8		0.93		25.4		15.61		57.9	—	38.15		49.4	
		19		12		32		22		19		2		20		11
31	9.02		36.6		1.25		23.2		15.80		58.1		38.35		48.3	
		22		14		40		17		21		5		24		7
April 10	9.24		35.2		1.65		21.5		16.01		58.6		38.59		47.6	
		25		15		45		11		24		8		27		2
20	9.49		33.7		2.10		20.4		16.25		59.4		38.86		47.4	—
		27		16		49		5		26		11		30		3
30	9.76		32.1		2.59		19.9	—	16.51		60.5		39.16		47.7	
		29		17		52		1		29		14		32		7
Mai 10	10.05		30.4		3.11		20.0		16.80		61.9		39.48		48.4	
		31		18		53		6		30		16		33		13
20	10.36		28.6		3.64		20.6		17.10		63.5		39.81		49.7	
		31		18		53		13		30		19		34		16
30	10.67		26.8		4.17		21.9		17.40		65.4		40.15		51.3	
		31		17		52		18		30		20		33		20
Juni 9	10.98		25.1		4.69		23.7		17.70		67.4		40.48		53.3	
		30		16		48		22		29		20		32		24
19	11.28		23.5		5.17		25.9		17.99		69.4		40.80		55.7	
		29		15		44		27		28		21		30		26
29	11.57		22.0		5.61		28.6		18.27		71.5		41.10		58.3	
		26		13		38		30		25		20		27		28
Juli 9	11.83		20.7		5.99		31.6		18.52		73.5		41.37		61.1	
		23		10		32		33		22		20		23		29
19	12.06		19.7		6.31		34.9		18.74		75.5		41.60		64.0	
		19		9		25		35		18		19		19		29
29	12.25		18.8		6.56		38.4		18.92		77.4		41.79		66.9	
		15		6		17		36		15		17		14		29
Aug. 8	12.40		18.2		6.73		42.0		19.07		79.1		41.93		69.8	
		10		3		9		36		10		15		10		28
18	12.50		17.9		6.82		45.6		19.17		80.6		42.03		72.6	
		6		1		1		36		5		13		4		27
28	12.56		17.8	—	6.83	—	49.2		19.22		81.9		42.07		75.3	
		2		1		6		34		2		11		0		25
Sept. 7	12.58	—	17.9		6.77		52.6		19.24	—	83.0		42.07		77.8	
		3		2		14		33		3		9		4		22
17	12.55		18.1		6.63		55.9		19.21		83.9		42.03		80.0	
		6		4		21		31		6		6		9		20
27	12.49		18.5		6.42		59.0		19.15		84.5		41.94		82.0	
		10		6		26		27		9		4		12		17
Oct. 7	12.39		19.1		6.16		61.7		19.06		84.9		41.82		83.7	
		12		7		32		23		11		2		14		13
17	12.27		19.8		5.84		64.0		18.95		85.1		41.68		85.0	
		13		7		35		18		13		0		16		10
27	12.14		20.5		5.49		65.8		18.82		85.1		41.52		86.0	
		15		7		39		14		14		2		18		6
Nov. 6	11.99		21.2		5.10		67.2		18.68		84.9		41.34		86.6	
		15		6		40		8		14		4		19		1
16	11.84		21.8		4.70		68.0		18.54		84.5		41.15		86.7	—
		14		7		41		3		14		6		18		3
26	11.70		22.5		4.29		68.3	—	18.40		83.9		40.97		86.4	
		13		6		40		4		13		7		18		6
Dec. 6	11.57		23.1		3.89		67.9		18.27		83.2		40.79		85.8	
		11		4		39		9		11		9		16		11
16	11.46		23.5		3.50		67.0		18.16		82.3		40.63		84.7	
		9		4		35		14		10		10		14		14
26	11.37		23.9		3.15		65.6		18.06		81.3		40.49		83.3	
		7		3		31		20		7		10		12		17
36	11.30		24.2		2.84		63.6		17.99		80.3		40.37		81.6	
Mittl. Ort	8.66		43.1		1.71		26.7		15.38		56.1		38.04		50.4	
	616)				520)				314)				315)			

1902	ζ Cephei. $3^m.4$. AR.		Decl. +		24 Cephei. $4^m.8$. AR.		Decl. +		ϑ Aquarii. $4^m.3$. AR.		Decl. −		γ Aquarii. $3^m.4$. AR.		Decl. −	
	$22^h\ 7^m$		57° 42′		$22^h\ 7^m$		71° 51′		$22^h\ 11^m$		8° 15′		$22^h\ 16^m$		1° 52′	
Jan. 0	$26^s.77$	24	85″.6	22	$54^s.40$	48	53″.0	21	$39^s.63$	6	73″.3	4	$35^s.59$	7	47″.1	7
10	26.53	19	83.4	25	53.92	40	50.9	25	39.57	3	73.7	4	35.52	4	47.8	7
20	26.34	13	80.9	28	53.52	30	48.4	28	39.54	1	74.1	3	35.48	1	48.5	6
30	26.21	7	78.1	30	53.22	18	45.6	31	39.53	— 2	74.4	1	35.47	— 1	49.1	6
Febr. 9	26.14	0	75.1	33	53.04	6	42.5	36	39.55	5	74.5	0	35.48	4	49.7	3
19	13. 26.14	8	71.8	30	18 52.98	— 8	38.9	32	39.60	9	74.5	2	35.52	8	50.0	2
März 1	26.22	14	68.8	28	53.06	21	35.7	31	19 39.69	11	74.3	5	21 35.60	11	50.2	— 1
11	26.36	22	66.0	25	53.27	33	32.6	28	39.80	14	73.8	6	35.71	14	50.1	3
21	26.58	29	63.5	21	53.60	45	29.8	24	39.94	18	73.2	9	35.85	17	49.8	6
31	26.87	35	61.4	16	54.05	55	27.4	19	40.12	21	72.3	12	36.02	20	49.2	8
April 10	27.22	39	59.8	10	54.60	63	25.5	14	40.33	24	71.1	13	36.22	23	48.4	11
20	27.61	43	58.8	5	55.23	69	24.1	8	40.57	26	69.8	15	36.45	26	47.3	13
30	28.04	46	58.3	— 1	55.92	74	23.3	3	40.83	28	68.3	17	36.71	28	46.0	16
Mai 10	28.50	47	58.4	7	56.66	75	23.0	— 4	41.11	30	66.6	17	36.99	30	44.4	17
20	28.97	48	59.1	13	57.41	75	23.4	10	41.41	31	64.9	18	37.29	30	42.7	18
30	29.45	46	60.4	18	58.16	73	24.4	16	41.72	30	63.1	19	37.59	30	40.9	19
Juni 9	29.91	44	62.2	23	58.89	68	26.0	21	42.02	30	61.2	18	37.89	30	39.0	20
19	30.35	41	64.5	26	59.57	61	28.1	25	42.32	28	59.4	17	38.19	28	37.0	19
29	30.76	35	67.1	30	60.18	54	30.6	29	42.60	27	57.7	15	38.47	26	35.1	18
Juli 9	31.11	30	70.1	33	60.72	44	33.5	32	42.87	23	56.2	14	38.73	23	33.3	17
19	31.41	24	73.4	34	61.16	34	36.7	35	43.10	19	54.8	12	38.96	19	31.6	15
29	31.65	17	76.8	35	61.50	23	40.2	36	43.29	16	53.6	10	39.15	16	30.1	13
Aug. 8	31.82	10	80.3	36	61.73	11	43.8	37	43.45	11	52.6	7	39.31	12	28.8	11
18	31.92	3	83.9	35	61.84	0	47.5	37	43.56	7	51.9	5	39.43	7	27.7	9
28	31.95	— 4	87.4	34	61.84	11	51.2	36	43.63	2	51.4	3	39.50	2	26.8	6
Sept. 7	31.91	10	90.8	32	61.73	21	54.8	35	43.65	— 1	51.1	0	39.52	— 1	26.2	5
17	31.81	16	94.0	29	61.52	32	58.3	32	43.64	6	51.1	1	39.51	4	25.7	2
27	31.65	22	96.9	26	61.20	40	61.5	30	43.58	8	51.2	3	39.47	8	25.5	0
Oct. 7	31.43	26	99.5	22	60.80	48	64.5	26	43.50	11	51.5	4	39.39	11	25.5	1
17	31.17	29	101.7	18	60.32	55	67.1	21	43.39	13	51.9	5	39.28	12	25.6	3
27	30.88	32	103.5	13	59.77	60	69.2	16	43.26	14	52.4	6	39.16	14	25.9	4
Nov. 6	30.56	34	104.8	8	59.17	63	70.8	11	43.12	14	53.0	6	39.02	13	26.3	6
16	30.22	34	105.6	2	58.54	65	71.9	6	42.98	14	53.6	7	38.89	14	26.9	6
26	29.88	34	105.8	— 3	57.89	65	72.5	0	42.84	12	54.3	6	38.75	13	27.5	7
Dec. 6	29.54	32	105.5	9	57.24	63	72.5	7	42.72	11	54.9	7	38.62	11	28.2	7
16	29.22	29	104.6	14	56.61	59	71.8	13	42.61	10	55.6	6	38.51	9	28.9	8
26	28.93	27	103.2	19	56.02	52	70.5	18	42.51	7	56.2	5	38.42	8	29.7	8
36	28.66		101.3		55.50		68.7		42.44		56.7		38.34		30.5	
Mittl. Ort	27.10		64.8		55.38		30.2		39.76		77.2		35.65		52.7	
	316)				521)				522)				317)			

1902	3 Lacertae. 4^{m}.4. AR.	Δ	Decl. +	Δ	7 Lacertae. 4^{m}.0. AR.	Δ	Decl. +	Δ	η Aquarii. 3^{m}.8. AR.	Δ	Decl. —	Δ	10 Lacertae. 5^{m}.0. AR.	Δ	Decl. +	Δ
	22^{h} 19^{m}		51° 44′		22^{h} 27^{m}		49° 46′		22^{h} 30^{m}		0° 36′		22^{h} 34^{m}		38° 32′	
Jan. 0	42.16^{s}	20	36.0″	20	15.14^{s}	19	61.9″	20	19.22^{s}	7	76.4″	8	51.90^{s}	14	41.4″	17
10	41.96	16	34.0	23	14.95	16	59.9	23	19.15	5	77.2	7	51.76	11	39.7	21
20	41.80	12	31.7	27	14.79	11	57.6	25	19.10	3	77.9	7	51.65	8	37.6	22
30	41.68	6	29.0	28	14.68	7	55.1	27	19.07	1	78.6	5	51.57	5	35.4	24
Febr. 9	41.62	1	26.2	29	14.61	2	52.4	28	19.06	— 3	79.1	4	51.52	1	33.0	24
19	41.61	— 6	23.3	31	14.59	— 5	49.6	30	19.09	7	79.5	3	51.51	— 4	30.6	26
März 1	^{22}41.67	12	20.2	26	^{24}14.64	11	46.6	26	^{24}19.16	9	79.8	0	^{26}51.55	9	28.0	21
11	41.79	18	17.6	24	14.75	16	44.0	23	19.25	12	79.8	2	51.64	14	25.9	19
21	41.97	24	15.2	19	14.91	22	41.7	19	19.37	16	79.6	5	51.78	18	24.0	15
31	42.21	29	13.3	15	15.13	27	39.8	15	19.53	19	79.1	8	51.96	23	22.5	11
April 10	42.50	34	11.8	10	15.40	32	38.3	10	19.72	23	78.3	11	52.19	27	21.4	6
20	42.84	37	10.8	4	15.72	36	37.3	4	19.95	25	77.2	13	52.46	30	20.8	1
30	43.21	40	10.4	— 1	16.08	39	36.9	— 1	20.20	27	75.9	15	52.76	32	20.7	— 4
Mai 10	43.61	42	10.5	7	16.47	40	37.0	6	20.47	29	74.4	17	53.08	35	21.1	9
20	44.03	43	11.2	12	16.87	41	37.6	12	20.76	30	72.7	18	53.43	36	22.0	13
30	44.46	42	12.4	17	17.28	41	38.8	17	21.06	31	70.9	19	53.79	36	23.3	18
Juni 9	44.88	40	14.1	22	17.69	40	40.5	22	21.37	30	69.0	20	54.15	35	25.1	21
19	45.28	37	16.3	26	18.09	37	42.7	25	21.67	29	67.0	19	54.50	33	27.2	25
29	45.65	34	18.9	29	18.46	34	45.2	28	21.96	27	65.1	19	54.83	30	29.7	27
Juli 9	45.99	29	21.8	32	18.80	29	48.0	31	22.23	24	63.2	18	55.13	27	32.4	29
19	46.28	24	25.0	33	19.09	24	51.1	33	22.47	20	61.4	16	55.40	22	35.3	30
29	46.52	18	28.3	33	19.33	19	54.4	33	22.67	17	59.8	14	55.62	18	38.3	30
Aug. 8	46.70	11	31.6	34	19.52	13	57.7	34	22.84	12	58.4	12	55.80	13	41.3	31
18	46.81	6	35.0	34	19.65	7	61.1	33	22.96	9	57.2	10	55.93	9	44.4	29
28	46.87	0	38.4	33	19.72	1	64.4	32	23.05	4	56.2	7	56.02	3	47.3	28
Sept. 7	46.87	6	41.7	30	19.73	— 4	67.6	31	23.09	0	55.5	5	56.05	— 2	50.1	26
17	46.81	12	44.7	28	19.69	10	70.7	27	23.09	4	55.0	3	56.03	5	52.7	24
27	46.69	16	47.5	25	19.59	14	73.4	25	23.05	7	54.7	1	55.98	10	55.1	21
Oct. 7	46.53	20	50.0	21	19.45	17	75.9	21	22.98	9	54.6	— 1	55.88	13	57.2	17
17	46.33	23	52.1	17	19.28	21	78.0	18	22.89	11	54.7	2	55.75	16	58.9	14
27	46.10	25	53.8	13	19.07	24	79.8	13	22.78	13	54.9	4	55.59	17	60.3	10
Nov. 6	45.85	27	55.1	8	18.83	25	81.1	8	22.65	13	55.3	5	55.42	19	61.3	5
16	45.58	28	55.9	2	18.58	26	81.9	3	22.52	14	55.8	6	55.23	19	61.8	1
26	45.30	28	56.1	— 2	18.32	26	82.2	— 3	22.38	12	56.4	7	55.04	19	61.9	— 3
Dec. 6	45.02	26	55.9	8	18.06	25	81.9	7	22.26	12	57.1	8	54.85	19	61.6	8
16	44.76	24	55.1	13	17.81	23	81.2	12	22.14	10	57.9	8	54.66	18	60.8	12
26	44.52	23	53.8	18	17.58	20	80.0	17	22.04	9	58.7	8	54.48	15	59.6	16
36	44.29		52.0		17.38		78.3		21.95		59.5		54.33		58.0	
Mittl. Ort	42.25		16.1		15.13		42.2		19.21		82.1		51.77		24.3	
	524)				319)				320)				526)			

1902	ζ Pegasi. 3m.3. AR.		ζ Pegasi. Decl. +		η Pegasi. 3m.0. AR.		η Pegasi. Decl. +		λ Pegasi. 4m.0. AR.		λ Pegasi. Decl. +		ι Cephei. 3m.4. AR.		ι Cephei. Decl. +	
	22h 36m		10° 19′		22h 38m		29° 42′		22h 41m		23° 2′		22h 46m		65° 40′	
Jan. 0	34.54	8	19.2	11	24.60	11	45.3	15	48.75	9	72.2	14	11.36	38	87.9	16
10	34.46	7	18.1	12	24.49	10	43.8	18	48.66	8	70.8	16	10.98	33	86.3	22
20	34.39	4	16.9	12	24.39	7	42.0	20	48.58	6	69.2	17	10.65	27	84.1	26
30	34.35	1	15.7	11	24.32	3	40.0	21	48.52	3	67.5	18	10.38	20	81.5	28
Febr. 9	34.34	— 2	14.6	11	24.29	0	37.9	20	48.49	0	65.7	17	10.18	11	78.7	31
19	34.36	6	13.5	10	24.29	5	35.9	21	48.49	4	64.0	17	10.07	2	75.6	31
März 1	[26] 34.42	8	12.5	6	[26] 24.34	8	33.8	17	[27] 48.53	8	62.3	14	10.05	— 9	72.5	33
11	34.50	11	11.9	4	24.42	12	32.1	15	48.61	12	60.9	11	[1] 10.14	18	69.2	28
21	34.61	16	11.5	1	24.54	17	30.6	11	48.73	15	59.8	8	10.32	28	66.4	26
31	34.77	19	11.4	— 3	24.71	20	29.5	7	48.88	20	59.0	4	10.60	36	63.8	21
April 10	34.96	22	11.7	5	24.91	24	28.8	3	49.08	23	58.6	0	10.96	44	61.7	17
20	35.18	25	12.2	9	25.15	28	28.5	— 2	49.31	26	58.6	4	11.40	50	60.0	11
30	35.43	28	13.1	12	25.43	30	28.7	6	49.57	29	59.0	8	11.90	55	58.9	5
Mai 10	35.71	29	14.3	15	25.73	32	29.3	11	49.86	30	59.8	12	12.45	58	58.4	0
20	36.00	30	15.8	18	26.05	33	30.4	15	50.16	32	61.0	16	13.03	60	58.4	7
30	36.30	31	17.6	19	26.38	34	31.9	18	50.48	32	62.6	19	13.63	60	59.1	12
Juni 9	36.61	30	19.5	21	26.72	33	33.7	21	50.80	32	64.5	21	14.23	58	60.3	17
19	36.91	29	21.6	22	27.05	31	35.8	24	51.12	30	66.6	23	14.81	54	62.0	22
29	37.20	27	23.8	22	27.36	29	38.2	26	51.42	28	68.9	25	15.35	49	64.2	26
Juli 9	37.47	24	26.0	21	27.65	25	40.8	27	51.70	25	71.4	25	15.84	43	66.8	30
19	37.71	21	28.1	21	27.90	22	43.5	28	51.95	22	73.9	26	16.27	37	69.8	32
29	37.92	17	30.2	20	28.12	18	46.3	28	52.17	18	76.5	25	16.64	28	73.0	35
Aug. 8	38.09	13	32.2	18	28.30	13	49.1	27	52.35	13	79.0	24	16.92	20	76.5	36
18	38.22	9	34.0	16	28.43	8	51.8	25	52.48	9	81.4	22	17.12	12	80.1	36
28	38.31	4	35.6	14	28.51	4	54.3	24	52.57	5	83.6	21	17.24	3	83.7	36
Sept. 7	38.35	1	37.0	11	28.55	0	56.7	22	52.62	0	85.7	19	17.27	— 5	87.3	35
17	38.36	— 3	38.1	9	28.55	4	58.9	20	52.62	3	87.6	16	17.22	13	90.8	34
27	38.33	7	39.0	7	28.51	8	60.9	17	52.59	7	89.2	14	17.09	21	94.2	31
Oct. 7	38.26	9	39.7	5	28.43	11	62.6	13	52.52	9	90.6	10	16.88	27	97.3	28
17	38.17	11	40.2	2	28.32	13	63.9	11	52.43	12	91.6	8	16.61	33	100.1	24
27	38.06	12	40.4	0	28.19	15	65.0	7	52.31	14	92.4	5	16.28	37	102.5	20
Nov. 6	37.94	13	40.4	3	28.04	16	65.7	3	52.17	14	92.9	1	15.91	41	104.5	15
16	37.81	14	40.1	5	27.88	16	66.0	— 1	52.03	15	93.0	— 2	15.50	44	106.0	9
26	37.67	13	39.6	6	27.72	17	65.9	4	51.88	15	92.8	5	15.06	46	106.9	3
Dec. 6	37.54	13	39.0	8	27.55	15	65.5	8	51.73	14	92.3	8	14.60	45	107.2	— 3
16	37.41	11	38.2	10	27.40	15	64.7	12	51.59	13	91.5	11	14.15	43	106.9	8
26	37.30	9	37.2	11	27.25	13	63.5	14	51.46	12	90.4	13	13.72	41	106.1	14
36	37.21		36.1		27.12		62.1		51.34		89.1		13.31		104.7	
Mittl. Ort	34.44		10.3		24.44		30.7		48.58		59.5		11.31		65.1	
	321)				322)				323)				325)			

1902	λ Aquarii. $4^m.0$				δ Aquarii. $3^m.0$				α Pisc. austr. $1^m.3$				o Andromed. $3^m.6$			
	AR.		Decl. —		AR.		Decl. —		AR.		Decl. —		AR.		Decl. +	
	$22^h\ 47^m$		8° 5′		$22^h\ 49^m$		16° 20′		$22^h\ 52^m$		30° 8′		$22^h\ 57^m$		41° 47′	
Jan. 0	30.13	8	61.7	5	26.94	9	31.2	2	13.97	11	34.7	3	24.93	17	75.0	15
10	30.05	7	62.2	4	26.85	7	31.4	0	13.86	8	34.4	6	24.76	14	73.5	19
20	29.98	4	62.6	3	26.78	4	31.4	1	13.78	5	33.8	9	24.62	11	71.6	22
30	29.94	1	62.9	1	26.74	2	31.3	3	13.73	3	32.9	11	24.51	8	69.4	24
Febr. 9	29.93	— 1	63.0	— 1	26.72	— 1	31.0	6	13.70	0	31.8	14	24.43	4	67.0	24
19	29.94	4	62.9	2	26.73	4	30.4	8	13.70	4	30.4	16	24.39	0	64.6	25
März 1	29.98	8	62.7	5	26.77	8	29.6	11	13.74	9	28.8	19	24.39	7	62.1	25
11	[1] 30.06	11	62.2	7	[1] 26.85	11	28.5	12	[2] 13.83	11	26.9	20	[4] 24.46	11	59.6	20
21	30.17	14	61.5	10	26.96	15	27.3	13	13.94	16	24.9	21	24.57	16	57.6	18
31	30.31	18	60.5	11	27.11	18	26.0	16	14.10	19	22.8	22	24.73	21	55.8	13
April 10	30.49	21	59.4	14	27.29	21	24.4	17	14.29	23	20.6	22	24.94	26	54.5	9
20	30.70	24	58.0	16	27.50	24	22.7	18	14.52	26	18.4	23	25.20	30	53.6	4
30	30.94	27	56.4	17	27.74	27	20.9	20	14.78	29	16.1	22	25.50	33	53.2	0
Mai 10	31.21	29	54.7	18	28.01	30	18.9	19	15.07	31	13.9	21	25.83	35	53.2	6
20	31.50	30	52.9	19	28.31	31	17.0	20	15.38	33	11.8	20	26.18	37	53.8	11
30	31.80	31	51.0	19	28.62	31	15.0	19	15.71	34	9.8	18	26.55	38	54.9	15
Juni 9	32.11	31	49.1	19	28.93	32	13.1	17	16.05	34	8.0	15	26.93	37	56.4	20
19	32.42	29	47.2	18	29.25	30	11.4	16	16.39	34	6.5	12	27.30	35	58.4	23
29	32.71	28	45.4	17	29.55	29	9.8	14	16.73	31	5.3	10	27.65	33	60.7	26
Juli 9	32.99	26	43.7	15	29.84	26	8.4	12	17.04	29	4.3	6	27.98	30	63.3	28
19	33.25	22	42.2	13	30.10	23	7.2	9	17.33	25	3.7	3	28.28	26	66.1	29
29	33.47	18	40.9	11	30.33	20	6.3	6	17.58	22	3.4	— 1	28.54	21	69.0	31
Aug. 8	33.65	15	39.8	8	30.53	15	5.7	4	17.80	17	3.5	4	28.75	16	72.1	31
18	33.80	10	39.0	5	30.68	11	5.3	1	17.97	12	3.9	7	28.91	11	75.2	31
28	33.90	6	38.5	3	30.79	6	5.2	— 2	18.09	7	4.6	10	29.02	6	78.3	29
Sept. 7	33.96	2	38.2	1	30.85	2	5.4	4	18.16	2	5.6	12	29.08	2	81.2	28
17	33.98	— 2	38.1	— 1	30.87	— 2	5.8	6	18.18	— 2	6.8	14	29.10	— 4	84.0	26
27	33.96	6	38.2	3	30.85	5	6.4	8	18.16	6	8.2	14	29.06	7	86.6	23
Oct. 7	33.90	8	38.5	5	30.80	9	7.2	8	18.10	10	9.6	15	28.99	11	88.9	20
17	33.82	10	39.0	6	30.71	11	8.0	9	18.00	13	11.1	14	28.88	14	90.9	16
27	33.72	12	39.6	6	30.60	12	8.9	9	17.87	14	12.5	13	28.74	17	92.5	13
Nov. 6	33.60	13	40.2	7	30.48	14	9.8	9	17.73	16	13.8	11	28.57	19	93.8	9
16	33.47	13	40.9	7	30.34	13	10.7	8	17.57	16	14.9	10	28.38	20	94.7	4
26	33.34	13	41.6	8	30.21	14	11.5	8	17.41	16	15.9	7	28.18	20	95.1	— 1
Dec. 6	33.21	12	42.4	7	30.07	13	12.3	6	17.25	15	16.6	4	27.98	20	95.0	5
16	33.09	11	43.1	6	29.94	11	12.9	4	17.10	14	17.0	1	27.78	19	94.5	10
26	32.98	9	43.7	5	29.83	10	13.3	3	16.96	12	17.1	— 1	27.59	18	93.5	14
36	32.89		44.2		29.73		13.6		16.84		17.0		27.41		92.1	
Mittl. Ort	30.09		64.6		26.96		31.5		14.16		30.9		24.60		57.1	
	326)				618)				619)				327)			

1902	β Pegasi. 2.2...2ᵐ.7. AR.		Decl. +		α Pegasi. 2ᵐ.0. AR.		Decl. +		c^2 Aquarii. 4ᵐ.0. AR.		Decl. —		π Cephei. 4ᵐ.6. AR.		Decl. +	
	$22^h\ 59^m$		27° 33′		$22^h\ 59^m$		14° 40′		$23^h\ 4^m$		21° 41′		$23^h\ 4^m$		74° 51′	
Jan. 0	1.62	12	17.6	14	52.94	10	50.6	12	13.33	10	77.7	1	47.01	69	51.6	13
10	1.50	10	16.2	16	52.84	8	49.4	13	13.23	9	77.8	— 2	46.32	62	50.3	19
20	1.40	8	14.6	18	52.76	6	48.1	13	13.14	6	77.6	4	45.70	52	48.4	23
30	1.32	5	12.8	19	52.70	4	46.8	13	13.08	3	77.2	6	45.18	42	46.1	27
Febr. 9	1.27	2	10.9	19	52.66	1	45.5	12	13.05	1	76.6	9	44.76	27	43.4	31
19	1.25	— 2	9.0	17	52.65	— 2	44.3	11	13.04	— 3	75.7	11	44.49	13	40.3	31
März 1	1.27	6	7.3	18	52.67	7	43.2	10	13.07	7	74.6	14	44.36	— 4	37.2	35
11	1.33	10	5.5	14	52.74	10	42.2	7	13.14	9	73.2	15	44.40	19	33.7	31
21	1.43	14	4.1	10	52.84	13	41.5	4	13.23	13	71.7	17	44.59	34	30.6	28
31	1.57	19	3.1	7	52.97	17	41.1	0	13.36	17	70.0	19	44.93	49	27.8	25
April 10	1.76	22	2.4	3	53.14	21	41.1	3	13.53	20	68.1	20	45.42	61	25.3	20
20	1.98	26	2.1	— 1	53.35	24	41.4	7	13.73	24	66.1	21	46.03	72	23.3	16
30	2.24	29	2.2	6	53.59	27	42.1	10	13.97	28	64.0	21	46.75	81	21.7	10
Mai 10	2.53	31	2.8	10	53.86	29	43.1	14	14.25	29	61.9	21	47.56	85	20.7	4
20	2.84	32	3.8	14	54.15	30	44.5	16	14.54	31	59.8	20	48.41	89	20.3	— 2
30	3.16	33	5.2	17	54.45	31	46.1	18	14.85	32	57.8	19	49.30	89	20.5	8
Juni 9	3.49	33	6.9	20	54.76	31	47.9	21	15.17	32	55.9	18	50.19	88	21.3	13
19	3.82	32	8.9	23	55.07	30	50.0	22	15.49	32	54.1	15	51.07	83	22.6	19
29	4.14	30	11.2	25	55.37	29	52.2	22	15.81	30	52.6	13	51.90	76	24.5	23
Juli 9	4.44	27	13.7	26	55.66	26	54.4	23	16.11	28	51.3	10	52.66	68	26.8	27
19	4.71	23	16.3	26	55.92	22	56.7	22	16.39	25	50.3	8	53.34	58	29.5	31
29	4.94	20	18.9	26	56.14	19	58.9	22	16.64	21	49.5	4	53.92	47	32.6	33
Aug. 8	5.14	15	21.5	26	56.33	16	61.1	20	16.85	17	49.1	0	54.39	34	35.9	36
18	5.29	11	24.1	25	56.49	11	63.1	18	17.02	12	49.1	2	54.73	22	39.5	37
28	5.40	7	26.6	23	56.60	6	64.9	17	17.14	8	49.3	4	54.95	9	43.2	37
Sept. 7	5.47	2	28.9	22	56.66	3	66.6	14	17.22	4	49.7	8	55.04	— 3	46.9	37
17	5.49	— 2	31.1	19	56.69	— 1	68.0	12	17.26	— 1	50.5	9	55.01	16	50.6	36
27	5.47	5	33.0	16	56.68	4	69.2	9	17.25	4	51.4	10	54.85	28	54.2	34
Oct. 7	5.42	8	34.6	14	56.64	7	70.1	7	17.21	8	52.4	11	54.57	39	57.6	31
17	5.34	11	36.0	10	56.57	10	70.8	5	17.13	10	53.5	12	54.18	48	60.7	28
27	5.23	13	37.0	7	56.47	12	71.3	2	17.03	12	54.7	11	53.70	58	63.5	25
Nov. 6	5.10	15	37.7	4	56.35	12	71.5	— 1	16.91	14	55.8	11	53.12	65	66.0	19
16	4.95	15	38.1	0	56.23	13	71.4	3	16.77	14	56.9	9	52.47	71	67.9	14
26	4.80	15	38.1	3	56.10	13	71.1	5	16.63	14	57.8	8	51.76	74	69.3	8
Dec. 6	4.65	15	37.8	6	55.97	13	70.6	7	16.49	14	58.6	6	51.02	76	70.1	2
16	4.50	14	37.2	10	55.84	12	69.9	10	16.35	12	59.2	4	50.26	76	70.3	— 4
26	4.36	13	36.2	13	55.72	11	68.9	11	16.23	11	59.6	2	49.50	73	69.9	10
36	4.23		34.9		55.61		67.8		16.12		59.8		48.77		68.9	
Mittl. Ort	1.31		3.6		52.68		40.6		13.34		75.9		46.75		27.4	
	328)				329)				620)				529)			

1902	Br. 3077. 6^m.0. AR.		Decl. +		τ Pegasi. 4^m.6. AR.		Decl. +		4 Cassiopej. 5^m.8. AR.		Decl. +		ϰ Piscium. 5^m.3. AR.		Decl. +	
	23^h 8^m		56° 37′		23^h 15^m		23° 12′		23^h 20^m		61° 44′		23^h 21^m		0° 43′	
Jan. 0	34^s.06	26	58″.8	15	47^s.50	12	25″.7	12	29^s.51	34	62″.8	13	54^s.77	10	13″.0	8
10	33.80	24	57.3	19	47.38	10	24.5	14	29.17	31	61.5	18	54.67	9	12.2	7
20	33.56	20	55.4	23	47.28	9	23.1	16	28.86	26	59.7	22	54.58	7	11.5	7
30	33.36	15	53.1	26	47.19	6	21.5	16	28.60	21	57.5	26	54.51	5	10.8	6
Febr. 9	33.21	9	50.5	28	47.13	3	19.9	16	28.39	15	54.9	28	54.46	2	10.2	4
19	33.12	3	47.7	28	47.10	0	18.3	16	28.24	8	52.1	30	54.44	0	9.8	3
März 1	33.09	— 5	44.9	31	47.10	5	16.7	15	28.16	— 2	49.1	32	54.44	5	9.5	1
11	^{7}33.14	12	41.8	27	^{9}47.15	8	15.2	12	^{10}28.18	10	45.9	28	^{10}54.49	7	9.4	— 2
21	33.26	19	39.1	23	47.23	12	14.0	8	28.28	18	43.1	26	54.56	11	9.6	4
31	33.45	26	36.8	20	47.35	16	13.2	5	28.46	26	40.5	22	54.67	14	10.0	7
April 10	33.71	32	34.8	16	47.51	21	12.7	2	28.72	34	38.3	19	54.81	18	10.7	10
20	34.03	38	33.2	10	47.72	24	12.5	— 2	29.06	40	36.4	13	54.99	23	11.7	13
30	34.41	42	32.2	5	47.96	27	12.7	7	29.46	46	35.1	8	55.22	25	13.0	14
Mai 10	34.83	46	31.7	— 1	48.23	29	13.4	10	29.92	50	34.3	2	55.47	27	14.4	16
20	35.29	48	31.8	6	48.52	31	14.4	14	30.42	53	34.1	— 3	55.74	29	16.0	19
30	35.77	48	32.4	11	48.83	33	15.8	17	30.95	53	34.4	9	56.03	31	17.9	19
Juni 9	36.25	47	33.5	16	49.16	32	17.5	19	31.48	53	35.3	14	56.34	30	19.8	20
19	36.72	46	35.1	21	49.48	32	19.4	22	32.01	52	36.7	19	56.64	31	21.8	20
29	37.18	43	37.2	25	49.80	30	21.6	23	32.53	48	38.6	23	56.95	29	23.8	19
Juli 9	37.61	38	39.7	28	50.10	27	23.9	25	33.01	44	40.9	27	57.24	27	25.7	19
19	37.99	34	42.5	31	50.37	25	26.4	25	33.45	39	43.6	30	57.51	24	27.6	17
29	38.33	28	45.6	33	50.62	21	28.9	24	33.84	32	46.6	33	57.75	21	29.3	15
Aug. 8	38.61	22	48.9	34	50.83	16	31.3	24	34.16	25	49.9	34	57.96	17	30.8	14
18	38.83	15	52.3	35	50.99	13	33.7	22	34.41	19	53.3	35	58.13	13	32.2	11
28	38.98	9	55.8	34	51.12	8	35.9	21	34.60	11	56.8	35	58.26	9	33.3	8
Sept. 7	39.07	2	59.2	33	51.20	5	38.0	20	34.71	4	60.3	35	58.35	5	34.1	6
17	39.09	— 3	62.5	32	51.25	0	40.0	17	34.75	— 3	63.8	34	58.40	2	34.7	4
27	39.06	9	65.7	30	51.25	3	41.7	14	34.72	9	67.2	31	58.42	— 2	35.1	2
Oct. 7	38.97	15	68.7	27	51.22	6	43.1	12	34.63	16	70.3	29	58.40	5	35.3	— 1
17	38.82	19	71.4	23	51.16	9	44.3	9	34.47	21	73.2	26	58.35	8	35.2	2
27	38.63	22	73.7	19	51.07	11	45.2	6	34.26	26	75.8	22	58.27	10	35.0	3
Nov. 6	38.41	26	75.6	14	50.96	13	45.8	3	34.00	31	78.0	17	58.17	10	34.7	5
16	38.15	28	77.0	10	50.83	13	46.1	0	33.69	33	79.7	12	58.07	12	34.2	6
26	37.87	30	78.0	4	50.70	14	46.1	4	33.36	35	80.9	7	57.95	12	33.6	7
Dec. 6	37.57	30	78.4	— 2	50.56	14	45.7	6	33.01	36	81.6	1	57.83	12	32.9	7
16	37.27	29	78.2	6	50.42	14	45.1	8	32.65	37	81.7	— 4	57.71	12	32.2	8
26	36.98	28	77.6	12	50.28	13	44.3	11	32.28	35	81.3	11	57.59	10	31.4	8
36	36.70		76.4		50.15		43.2		31.93		80.2		57.49		30.6	
Mittl. Ort	33.61		37.4		47.09		13.3		28.88		40.5		54.47		8.2	
	530)				531)				533)				534)			

1902	70 Pegasi. 5ᵐ.0. AR.		Decl. +		ι Andromedae. 4ᵐ.0. AR.		Decl. +		ι Piscium. 4ᵐ.3. AR.		Decl. +	
	23ʰ 24ᵐ		12° 13′		23ʰ 33ᵐ		42° 43′		23ʰ 34ᵐ		5° 5′	
Jan. 0	12ˢ.20	11	19″.5	10	20ˢ.32	18	49″.1	13	54ˢ.93	11	47″.7	8
10	12.09	10	18.5	11	20.14	17	47.8	16	54.82	9	46.9	9
20	11.99	7	17.4	12	19.97	15	46.2	19	54.73	8	46.0	8
30	11.92	6	16.2	11	19.82	12	44.3	22	54.65	6	45.2	8
Febr. 9	11.86	3	15.1	10	19.70	9	42.1	23	54.59	4	44.4	7
19	11.83	0	14.1	10	19.61	4	39.8	23	54.55	1	43.7	5
März 1	11.83	4	13.1	7	19.57	—1	37.5	23	54.54	—2	43.2	4
11	11.87	8	12.4	6	19.58	7	35.2	24	54.56	7	42.8	1
21	11 11.95	10	11.8	3	13 19.65	12	32.8	19	14 54.63	10	42.7	—2
31	12.05	14	11.5	—1	19.77	17	30.9	15	54.73	14	42.9	4
April 10	12.19	19	11.6	4	19.94	23	29.4	12	54.87	17	43.3	7
20	12.38	22	12.0	7	20.17	27	28.2	7	55.04	21	44.0	10
30	12.60	25	12.7	10	20.44	31	27.5	3	55.25	24	45.0	13
Mai 10	12.85	28	13.7	13	20.75	34	27.2	—3	55.49	27	46.3	15
20	13.13	30	15.0	16	21.09	37	27.5	7	55.76	29	47.8	17
30	13.43	31	16.6	18	21.46	38	28.2	12	56.05	30	49.5	18
Juni 9	13.74	31	18.4	20	21.84	38	29.4	16	56.35	31	51.3	20
19	14.05	31	20.4	21	22.22	38	31.0	20	56.66	31	53.3	21
29	14.36	29	22.5	22	22.60	36	33.0	23	56.97	29	55.4	20
Juli 9	14.65	27	24.7	22	22.96	33	35.3	26	57.26	28	57.4	19
19	14.92	24	26.9	21	23.29	30	37.9	28	57.54	25	59.3	19
29	15.16	21	29.0	20	23.59	25	40.7	29	57.79	22	61.2	17
Aug. 8	15.37	18	31.0	19	23.84	21	43.6	30	58.01	18	62.9	16
18	15.55	13	32.9	17	24.05	16	46.6	30	58.19	14	64.5	13
28	15.68	9	34.6	15	24.21	12	49.6	29	58.33	11	65.8	11
Sept. 7	15.77	6	36.1	13	24.33	6	52.5	29	58.44	7	66.9	9
17	15.83	1	37.4	11	24.39	2	55.4	27	58.51	2	67.8	6
27	15.84	—2	38.5	8	24.41	—3	58.1	25	58.53	—1	68.4	4
Oct. 7	15.82	4	39.3	6	24.38	7	60.6	22	58.52	4	68.8	2
17	15.78	8	39.9	4	24.31	10	62.8	19	58.48	6	69.0	0
27	15.70	9	40.3	1	24.21	13	64.7	15	58.42	8	69.0	1
Nov. 6	15.61	11	40.4	—1	24.08	16	66.2	11	58.34	10	68.9	4
16	15.50	12	40.3	3	23.92	18	67.3	8	58.24	11	68.5	5
26	15.38	13	40.0	5	23.74	19	68.1	3	58.13	12	68.0	6
Dec. 6	15.25	12	39.5	6	23.55	19	68.4	—1	58.01	12	67.4	7
16	15.13	12	38.9	8	23.36	20	68.3	6	57.89	11	66.7	8
26	15.01	12	38.1	10	23.16	20	67.7	11	57.78	12	65.9	9
36	14.89		37.1		22.96		66.6		57.66		65.0	
Mittl. Ort	11.80		10.9		19.66		31.2		54.52		41.9	
		535)				332)				333)		

1902	γ Cephei. $3^m.3$.				ω² Aquarii. $4^m.6$.				41 H. Cephei. $5^m.6$.			
	AR.		Decl. +		AR.		Decl. −		AR.		Decl. +	
	$23^h\ 35^m$		77° 4′		$23^h\ 37^m$		15° 4′		$23^h\ 43^m$		67° 15′	
Jan. 0	20.43	86	91.0	9	38.67	11	73.7	3	14.13	45	67.1	9
10	19.57	80	90.1	14	38.56	10	74.0	2	13.68	43	66.2	15
20	18.77	71	88.7	20	38.46	8	74.2	0	13.25	38	64.7	20
30	18.06	59	86.7	25	38.38	6	74.2	2	12.87	33	62.7	24
Febr. 9	17.47	45	84.2	28	38.32	4	74.0	4	12.54	25	60.3	27
19	17.02	28	81.4	30	38.28	1	73.6	7	12.29	16	57.6	29
März 1	16.74	10	78.4	32	38.27	— 2	72.9	9	12.13	6	54.7	30
11	16.64	— 9	75.2	34	38.29	6	72.0	13	12.07	— 6	51.7	33
21	[14] 16.73	26	71.8	29	[14] 38.35	10	70.7	13	[16] 12.13	16	48.4	28
31	16.99	45	68.9	27	38.45	13	69.4	16	12.29	26	45.6	25
April 10	17.44	61	66.2	24	38.58	17	67.8	17	12.55	36	43.1	22
20	18.05	74	63.8	19	38.75	21	66.1	19	12.91	45	40.9	17
30	18.79	87	61.9	14	38.96	24	64.2	21	13.36	52	39.2	12
Mai 10	19.66	95	60.5	8	39.20	26	62.1	21	13.88	58	38.0	7
20	20.61	102	59.7	3	39.46	29	60.0	20	14.46	61	37.3	1
30	21.63	104	59.4	— 3	39.75	31	58.0	21	15.07	64	37.2	— 5
Juni 9	22.67	103	59.7	9	40.06	31	55.9	20	15.71	65	37.7	10
19	23.70	100	60.6	15	40.37	32	53.9	18	16.36	63	38.7	15
29	24.70	95	62.1	19	40.69	30	52.1	16	16.99	60	40.2	20
Juli 9	25.65	87	64.0	24	40.99	29	50.5	14	17.59	55	42.2	24
19	26.52	77	66.4	28	41.28	26	49.1	12	18.14	50	44.6	28
29	27.29	65	69.2	31	41.54	23	47.9	8	18.64	43	47.4	31
Aug. 8	27.94	52	72.3	34	41.77	19	47.1	6	19.07	35	50.5	33
18	28.46	39	75.7	35	41.96	15	46.5	2	19.42	28	53.8	35
28	28.85	24	79.2	37	42.11	11	46.3	0	19.70	18	57.3	36
Sept. 7	29.09	10	82.9	38	42.22	7	46.3	4	19.88	10	60.9	36
17	29.19	— 4	86.7	37	42.29	3	46.7	5	19.98	2	64.5	35
27	29.15	20	90.4	36	42.32	— 1	47.2	8	20.00	— 7	68.0	34
Oct. 7	28.95	33	94.0	33	42.31	4	48.0	9	19.93	14	71.4	32
17	28.62	45	97.3	31	42.27	7	48.9	10	19.79	22	74.6	29
27	28.17	57	100.4	28	42.20	9	49.9	10	19.57	29	77.5	26
Nov. 6	27.60	68	103.2	24	42.11	11	50.9	11	19.28	34	80.1	21
16	26.92	77	105.6	18	42.00	12	52.0	10	18.94	39	82.2	17
26	26.15	83	107.4	13	41.88	12	53.0	9	18.55	44	83.9	11
Dec. 6	25.32	88	108.7	7	41.76	13	53.9	8	18.11	45	85.0	5
16	24.44	89	109.4	0	41.63	12	54.7	6	17.66	47	85.5	0
26	23.55	88	109.4	5	41.51	12	55.3	5	17.19	47	85.5	6
36	22.67		108.9		41.39		55.8		16.72		84.9	
Mittl. Ort	19.23		66.7		38.43		72.6		13.05		44.1	
		334)				621)				537)		

1902	Lac. δ Sculptoris. $4^m.4$. AR.		Decl. −		φ Pegasi. $5^m.6$. AR.		Decl. +		ω Piscium. $4^m.0$. AR.		Decl. +	
	$23^h\ 43^m$		28° 39′		$23^h\ 47^m$		18° 34′		$23^h\ 54^m$		6° 19′	
Jan. 0	49.34	14	85.8	0	30.60	12	43.3	10	17.20	11	20.5	8
10	49.20	12	85.8	3	30.48	11	42.3	12	17.09	11	19.7	9
20	49.08	10	85.5	6	30.37	10	41.1	13	16.98	9	18.8	8
30	48.98	8	84.9	9	30.27	8	39.8	13	16.89	8	18.0	8
Febr. 9	48.90	5	84.0	12	30.19	6	38.5	13	16.81	5	17.2	7
19	48.85	2	82.8	14	30.13	3	37.2	12	16.76	3	16.5	6
März 1	48.83	—1	81.4	17	30.10	—1	36.0	11	16.73	0	15.9	4
11	48.84	5	79.7	21	30.11	5	34.9	10	16.73	4	15.5	2
21	[16] 48.89	9	77.6	21	[17] 30.16	9	33.9	7	[19] 16.77	8	15.3	—1
31	48.98	14	75.5	23	30.25	12	33.2	3	16.85	12	15.4	4
April 10	49.12	17	73.2	24	30.37	17	32.9	0	16.97	16	15.8	6
20	49.29	21	70.8	24	30.54	21	32.9	3	17.13	19	16.4	9
30	49.50	25	68.4	24	30.75	25	33.2	7	17.32	23	17.3	12
Mai 10	49.75	28	66.0	24	31.00	27	33.9	10	17.55	26	18.5	14
20	50.03	30	63.6	23	31.27	30	34.9	13	17.81	28	19.9	17
30	50.33	33	61.3	21	31.57	31	36.2	16	18.09	30	21.6	18
Juni 9	50.66	33	59.2	19	31.88	32	37.8	19	18.39	31	23.4	19
19	50.99	34	57.3	17	32.20	32	39.7	20	18.70	31	25.3	20
29	51.33	33	55.6	13	32.52	30	41.7	22	19.01	30	27.3	21
Juli 9	51.66	31	54.3	10	32.82	29	43.9	22	19.31	28	29.4	20
19	51.97	28	53.3	7	33.11	27	46.1	23	19.59	26	31.4	19
29	52.25	25	52.6	2	33.38	23	48.4	22	19.85	24	33.3	18
Aug. 8	52.50	21	52.4	—1	33.61	19	50.6	21	20.09	20	35.1	16
18	52.71	17	52.5	5	33.80	16	52.7	20	20.29	16	36.7	14
28	52.88	13	53.0	8	33.96	11	54.7	19	20.45	12	38.1	11
Sept. 7	53.01	8	53.8	11	34.07	8	56.6	16	20.57	8	39.2	10
17	53.09	3	54.9	13	34.15	4	58.2	15	20.65	5	40.2	7
27	53.12	0	56.2	15	34.19	1	59.7	12	20.70	1	40.9	5
Oct. 7	53.12	5	57.7	16	34.20	—3	60.9	10	20.71	—2	41.4	3
17	53.07	8	59.3	16	34.17	6	61.9	7	20.69	4	41.7	0
27	52.99	10	60.9	16	34.11	8	62.6	5	20.65	7	41.7	1
Nov. 6	52.89	13	62.5	14	34.03	9	63.1	2	20.58	9	41.6	3
16	52.76	14	63.9	13	33.94	12	63.3	0	20.49	10	41.3	4
26	52.62	15	65.2	10	33.82	12	63.3	3	20.39	11	40.9	5
Dec. 6	52.47	15	66.2	8	33.70	13	63.0	5	20.28	12	40.4	7
16	52.32	15	67.0	5	33.57	13	62.5	7	20.16	12	39.7	8
26	52.17	14	67.5	2	33.44	13	61.8	10	20.04	12	38.9	8
36	52.03		67.7		33.31		60.8		19.92		38.1	
Mittl. Ort	49.22		80.3		30.01		33.1		16.67		14.8	
			622)				538)				336)	

für die 172 Sterne des Jahrbuchsverzeichnisses, von denen nur mittl. Oerter gegeben sind.

Nr. des Fund.-Kat.	log. a	log. b	log. c	log. d	log. a'	log. b'	log. c'	log. d'
337	0.4919	8.8318	8.9783	7.3364	1.3020	8.3579_n	9.4589	9.8533
338	0.5224	9.4400	9.4523	8.1198	1.3017	8.6670_n	8.7544	9.9872
5	0.5286	9.1023	9.1548	8.2348	1.2990	9.0769_n	8.9793	9.9444
8	0.5023	8.5591	8.8766	8.0429	1.2975	9.1617_n	9.4919	9.6779
12	0.5394	9.0086	9.0835	8.3636	1.2944	9.2723_n	8.8856	9.9173
342	0.4919	7.9084	8.8193	8.1038	1.2942	9.2766_n	9.6099	9.0812
343	0.5561	9.1220	9.1693	8.4657	1.2938	9.2880_n	8.2572	9.9443
345	0.6981	9.5244	9.5322	8.9884	1.2851	9.4391_n	9.2749_n	9.9752
541	0.4777	8.0834_n	8.8146	8.2695	1.2851	9.4380_n	9.6786	9.2518_n
17	0.5171	8.5594	8.8661	8.3395	1.2838	9.4550_n	9.3740	9.6749
346	0.6201	9.1829	9.2169	8.7720	1.2758	9.5288_n	9.1682_n	9.9397
349	0.4942	7.7256	8.7860	8.4363	1.2626	9.6107_n	9.5985	8.9000
28	0.5158	8.3060	8.7975	8.5054	1.2519	9.6576_n	9.4217	9.4582
351	0.5944	8.8390	8.9509	8.7428	1.2316	9.7214_n	9.1193_n	9.8176
352	0.5504	8.5672	8.8265	8.6369	1.2264	9.7346_n	8.8025	9.6649
354	0.5226	8.2946	8.7722	8.5875	1.2249	9.7381_n	9.3558	9.4452
36	0.6890	9.1073	9.1434	8.9926	1.2142	9.7612_n	9.5578_n	9.8760
356	0.7075	9.0946	9.1293	9.0392	1.1921	9.7998_n	9.6186_n	9.8552
357	0.5454	8.4244	8.7630	8.6780	1.1900	9.8028_n	8.9747	9.5492
41	0.4934	7.4039	8.7115	8.6284	1.1892	9.8040_n	9.6042	8.5795
43	0.6380	8.8651	8.9492	8.8866	1.1807	9.8159_n	9.4677_n	9.7945
51	0.6211	8.7341	8.8548	8.8623	1.1478	9.8532_n	9.4099_n	9.7250
54	0.5110	7.8462	8.6336	8.7170	1.1060	9.8872_n	9.4802	9.0165
362	0.6244	8.6639	8.7952	8.8855	1.1018	9.8900_n	9.4495_n	9.6684
363	0.7135	8.8902	8.9407	9.0701	1.0774	9.9047_n	9.7136_n	9.7248
58	0.5743	8.3828	8.6589	8.8063	1.0656	9.9109_n	8.8021_n	9.4874
550	0.4592	7.8369_n	8.5932	8.7421	1.0646	9.9114_n	9.7559	9.0062_n
60	0.5508	8.2296	8.6236	8.7746	1.0633	9.9121_n	8.8276	9.3671
62	0.5514	8.2169	8.6118	8.7801	1.0516	9.9177_n	8.8046	9.3545
367	0.5899	8.3076	8.5564	8.8589	0.9515	9.9518_n	9.1659_n	9.4006
70	0.5318	7.9124	8.4885	8.7918	0.9509	9.9520_n	9.2568	9.0726
368	0.6754	8.5660	8.6597	9.0125	0.9103	9.9610_n	9.6810_n	9.5145
75	0.4767	7.1330_n	8.3556	8.7981	0.8331	9.9734_n	9.6896	8.3083_n
77	0.5043	7.3041	8.3274	8.8028	0.8037	9.9770_n	9.5340	8.4782
82	0.6219	8.2048	8.3885	8.9283	0.7450	9.9826_n	9.4797_n	9.2592
85	0.4579	7.3978_n	8.2093	8.8163	0.6824	9.9871_n	9.7623	8.5687_n
88	0.4644	7.2202_n	8.1374	8.8178	0.6124	9.9907_n	9.7396	8.3931_n
89	0.4794	6.7063_n	8.0688	8.8175	0.5467	9.9932_n	9.6777	7.8819_n
555	0.4100	7.5982_n	8.0471	8.8479	0.4959	9.9946_n	9.8790	8.7449_n
376	0.5176	7.1676	7.9535	8.8259	0.4258	9.9961_n	9.4244	8.3378
94	0.4693	6.9129_n	7.9349	8.8223	0.4112	9.9964_n	9.7211	8.0870_n
95	0.4692	6.9134_n	7.9333	8.8223	0.4096	9.9964_n	9.7215	8.0877_n
99	0.4787	6.5472_n	7.8812	8.8215	0.3589	9.9972_n	9.6807	7.7228_n

für die 172 Sterne des Jahrbuchsverzeichnisses, von denen nur mittl. Oerter gegeben sind.

Nr. des Fund.-Kat.	log. a	log. b	log. c	log. d	log. a'	log. b'	log. c'	log. d'
557	0.4017	7.3727$_n$	7.7903	8.8566	0.2343	9.9984$_n$	9.8931	8.5146$_n$
378	0.5438	7.2290	7.7463	8.8436	0.2035	9.9986$_n$	9.0428	8.3840
101	0.6188	7.5590	7.7584	8.9332	0.1265	9.9990$_n$	9.4668$_n$	8.6243
559	0.4088	7.1559$_n$	7.6038	8.8528	0.0525	9.9993$_n$	9.8815	8.3026$_n$
560	0.4370	6.7728$_n$	7.3835	8.8371	9.8483	9.9997$_n$	9.8232	7.9355$_n$
380	0.5011	4.6335	5.7782	8.8251	8.2558	0.0000$_n$	9.5564	5.8261
381	0.7809	7.2847$_n$	7.3245$_n$	9.2101	9.4155$_n$	0.0000$_n$	9.8653$_n$	8.0744$_n$
384	0.7242	7.7262$_n$	7.7929$_n$	9.1122	9.9824$_n$	9.9995$_n$	9.8018$_n$	8.6134$_n$
390	0.6365	8.0400$_n$	8.2008$_n$	8.9581	0.5383$_n$	9.9935$_n$	9.5640$_n$	9.0754$_n$
391	0.8125	8.5119$_n$	8.5418$_n$	9.2619	0.5743$_n$	9.9923$_n$	9.8817$_n$	9.2423$_n$
393	0.9442	8.7617$_n$	8.7728$_n$	9.4665	0.5998$_n$	9.9913$_n$	9.9338$_n$	9.2865$_n$
396	0.6213	8.2494$_n$	8.4319$_n$	8.9252	0.7876$_n$	9.9787$_n$	9.4745$_n$	9.3029$_n$
402	0.6423	8.5222$_n$	8.6524$_n$	8.9472	0.9576$_n$	9.9503$_n$	9.5677$_n$	9.5253$_n$
403	0.7127	8.7493$_n$	8.8092$_n$	9.0775	0.9785$_n$	9.9446$_n$	9.7433$_n$	9.6164$_n$
410	0.8312	9.1472$_n$	9.1644$_n$	9.2840	1.0837$_n$	9.9012$_n$	9.8100$_n$	9.7643$_n$
411	0.6506	8.7371$_n$	8.8344$_n$	8.9415	1.0916$_n$	9.8965$_n$	9.5670$_n$	9.6921$_n$
128	0.5043	7.7106$_n$	8.6386$_n$	8.7087	1.1138$_n$	9.8817$_n$	9.5326	8.8836$_n$
412	0.5644	8.4279$_n$	8.7167$_n$	8.7612	1.1282$_n$	9.8706$_n$	7.9897$_n$	9.5373$_n$
413	0.7385	9.0550$_n$	9.0878$_n$	9.1116	1.1394$_n$	9.8611$_n$	9.7084$_n$	9.8044$_n$
414	0.6459	8.8168$_n$	8.9052$_n$	8.9171	1.1456$_n$	9.8554$_n$	9.5237$_n$	9.7550$_n$
416	0.5959	8.6661$_n$	8.8273$_n$	8.7992	1.1652$_n$	9.8350$_n$	9.1981$_n$	9.7018$_n$
135	0.5740	8.5768$_n$	8.7952$_n$	8.7467	1.1745$_n$	9.8239$_n$	8.7617$_n$	9.6540$_n$
420	0.7178	9.1604$_n$	9.1883$_n$	9.0580	1.2071$_n$	9.7747$_n$	9.6103$_n$	9.8771$_n$
141	0.5073	7.9928$_n$	8.7389$_n$	8.6004	1.2100$_n$	9.7694$_n$	9.5068	9.1618$_n$
144	0.5362	8.4436$_n$	8.7946$_n$	8.6105	1.2248$_n$	9.7385$_n$	9.1592	9.5716$_n$
422	0.5684	8.6991$_n$	8.8776$_n$	8.6748	1.2302$_n$	9.7252$_n$	8.4355$_n$	9.7495$_n$
425	0.8892	9.6949$_n$	9.6981$_n$	9.3709	1.2587$_n$	9.6293$_n$	9.5686$_n$	9.9533$_n$
151	0.5002	8.0255$_n$	8.7941$_n$	8.4237	1.2659$_n$	9.5934$_n$	9.5571	9.1952$_n$
428	0.5897	8.9859$_n$	9.0594$_n$	8.6828	1.2669$_n$	9.5880$_n$	8.9752$_n$	9.8912$_n$
429	0.6394	9.2234$_n$	9.2516$_n$	8.8354	1.2724$_n$	9.5540$_n$	9.2657$_n$	9.9420$_n$
430	0.5156	8.4380$_n$	8.8338$_n$	8.4061	1.2738$_n$	9.5439$_n$	9.4092	9.5758$_n$
577	0.4701	8.2484	8.8166$_n$	8.3487	1.2783$_n$	9.5083$_n$	9.7031	9.4080
152	0.5263	8.6431$_n$	8.8873$_n$	8.4001	1.2802$_n$	9.4910$_n$	9.2552	9.7340$_n$
433	0.6951	9.4882$_n$	9.4974$_n$	8.9818	1.2828$_n$	9.4651$_n$	9.2962$_n$	9.9715$_n$
435	0.5327	8.8903$_n$	9.0060$_n$	8.3411	1.2922$_n$	9.3251$_n$	9.0674	9.8744$_n$
158	0.5110	8.6118$_n$	8.8867$_n$	8.2051	1.2929$_n$	9.3093$_n$	9.4138	9.7160$_n$
161	0.4941	8.1083$_n$	8.8250$_n$	8.0843	1.2951$_n$	9.2522$_n$	9.5927	9.2762$_n$
580	0.4773	8.3065	8.8370$_n$	8.0835	1.2955$_n$	9.2398$_n$	9.6682	9.4629
437	0.5140	8.7994$_n$	8.9599$_n$	8.1444	1.2971$_n$	9.1795$_n$	9.3204	9.8345$_n$
440	0.4865	9.4765$_n$	9.4870$_n$	6.5694$_n$	1.3022$_n$	7.0824	8.9793	9.9895$_n$
583	0.4902	8.3087	8.8428$_n$	7.5150$_n$	1.3017$_n$	8.6716	9.6033	9.4654
441	0.4794	8.7657$_n$	8.9470$_n$	7.6370$_n$	1.3016$_n$	8.6895	9.5546	9.8182$_n$
442	0.4730	8.7392$_n$	8.9351$_n$	7.8990$_n$	1.3003$_n$	8.9619	9.5942	9.8022$_n$

für die 172 Sterne des Jahrbuchsverzeichnisses, von denen nur mittl. Oerter gegeben sind.

Nr. des Fund.-Kat.	log. a	log. b	log. c	log. d	log. a'	log. b'	log. c'	log. d'
444	0.4514	9.0415_n	9.1087_n	8.1548_n	1.2995_n	9.0434	9.5031	9.9301_n
172	0.4880	7.0204	8.8184_n	8.0265_n	1.2966_n	9.2026	9.6347	8.1962
450	0.4420	8.7146_n	8.9155_n	8.3840_n	1.2841_n	9.4505	9.7115	9.7810_n
451	0.4325	8.7419_n	8.9242_n	8.4433_n	1.2796_n	9.4966	9.7269	9.7952_n
455	0.1595	9.2672_n	9.2896_n	8.9322_n	1.2639_n	9.6043	9.7141	9.9393_n
456	0.2437	9.1087_n	9.1507_n	8.8605_n	1.2515_n	9.6592	9.7753	9.9073_n
189	0.3309	8.8510_n	8.9556_n	8.7710_n	1.2249_n	9.7381	9.8440	9.8182_n
191	0.4910	7.2276	8.7332_n	8.5911_n	1.2113_n	9.7670	9.6184	8.4035
460	0.2130	8.9749_n	9.0345_n	8.9158_n	1.2030_n	9.7821	9.8694	9.8412_n
461	0.3503	8.7130_n	8.8649_n	8.7701_n	1.1939_n	9.7970	9.8747	9.7399_n
195	0.4564	8.1152_n	8.7271_n	8.6372_n	1.1919_n	9.8000	9.7596	9.2780_n
589	0.5210	8.1452	8.7159_n	8.6599_n	1.1778_n	9.8197	9.3810	9.3050
464	9.9799	9.0388_n	9.0770_n	9.0620_n	1.1590_n	9.8418	9.9087	9.8187_n
592	0.5335	8.2077	8.6859_n	8.7110_n	1.1387_n	9.8617	9.2235	9.3584
466	0.4744	7.6206_n	8.6548_n	8.6940_n	1.1312_n	9.8682	9.6991	8.7948_n
468	0.4444	8.0801_n	8.6458_n	8.7268_n	1.1074_n	9.8862	9.7970	9.2395_n
207	0.3322	8.5553_n	8.7363_n	8.8446_n	1.0908_n	9.8969	9.9274	9.6076_n
208	0.3839	8.4014_n	8.6810_n	8.7920_n	1.0891_n	9.8980	9.8946	9.5074_n
469	0.3321	8.5316_n	8.7176_n	8.8496_n	1.0758_n	9.9056	9.9312	9.5877_n
210	0.3541	8.4703_n	8.6913_n	8.8288_n	1.0722_n	9.9075	9.9204	9.5490_n
211	0.4025	8.2859_n	8.6348_n	8.7840_n	1.0644_n	9.9115	9.8769	9.4134_n
470	9.9540	8.8592_n	8.9097_n	9.0855_n	1.0464_n	9.9201	9.9723	9.6938_n
218	0.4390	8.0053_n	8.5655_n	8.7694_n	1.0266_n	9.9283	9.8132	9.1643_n
471	0.1575	8.6926_n	8.7791_n	8.9980_n	1.0157_n	9.9324	9.9777	9.6270_n
221	0.2767	8.5066_n	8.6557_n	8.9194_n	0.9820_n	9.9436	9.9679	9.5307_n
473	0.4416	7.8513_n	8.4598_n	8.7956_n	0.9245_n	9.9581	9.8089	9.0138_n
474	0.2512_n	9.0510_n	9.0641_n	9.3973_n	0.9266_n	9.9576	9.9935	9.6113_n
475	0.1162	8.6022_n	8.6865_n	9.0292_n	0.9187_n	9.9593	9.9982	9.5322_n
227	0.4808	7.0090_n	8.4251_n	8.7866_n	0.9030_n	9.9624	9.6709	8.1847_n
476	0.4170_n	9.0432_n	9.0534_n	9.4628_n	0.8621_n	9.9693	0.0013	9.5498_n
231	0.3613	8.1624_n	8.4408_n	8.8658_n	0.8485_n	9.9713	9.9354	9.2679_n
479	0.4436	7.5900_n	8.2420_n	8.8203_n	0.7092_n	9.9854	9.8050	8.7550_n
480	0.2920	8.1369_n	8.3230_n	8.9310_n	0.6814_n	9.9872	9.9830	9.1930_n
481	0.2010	8.0674_n	8.1940_n	8.9960_n	0.4948_n	9.9947	0.0113	9.0661_n
242	0.0652	8.0949_n	8.1802_n	9.0644_n	0.4143_n	9.9963	0.0261	9.0268_n
243	0.0655	8.0934_n	8.1788_n	9.0643_n	0.4130_n	9.9964	0.0261	9.0255_n
482	9.3887_n	8.3023_n	8.3345_n	9.2509_n	0.3826_n	9.9968	0.0346	9.0482_n
247	0.4784	6.3749_n	7.6949_n	8.8232_n	0.1726_n	9.9988	9.6822	7.5505_n
251	0.3663	6.9930_n	7.3043_n	8.8830_n	9.7232_n	9.9998	9.9380	8.1102_n
486	0.2708	7.5200	7.6935	8.9530_n	0.0419	9.9993	9.9963	8.5663
487	9.4652	7.9072	7.9522	9.1870_n	0.0066	9.9993	0.0365	8.7194
489	9.9319_n	8.2788	8.3024	9.3156_n	0.2869	9.9980	0.0342	8.9612
490	0.4586_n	8.6530	8.6634	9.4826_n	0.4780	9.9951	0.0250	9.1654

für die 172 Sterne des Jahrbuchsverzeichnisses, von denen nur mittl. Oerter gegeben sind.

Nr. des Fund.-Kat.	log. a	log. b	log. c	log. d	log. a'	log. b'	log c'	log. d'
491	9.2758	8.3565	8.3978	9.1992$_n$	0.4954	9.9946	0.0329	9.1520
261	0.2980	7.9923	8.1882	8.9299$_n$	0.5534	9.9930	9.9828	9.0554
262	0.2984	7.9918	8.1882	8.9295$_n$	0.5538	9.9930	9.9826	9.0553
267	0.4356	7.6273	8.2162	8.8261$_n$	0.6795	9.9873	9.8257	8.7885
493	9.8643$_n$	8.6717	8.6956	9.3020$_n$	0.6828	9.9871	0.0248	9.3567
494	0.3306	8.1234	8.3547	8.8986$_n$	0.7412	9.9830	9.9617	9.2077
497	0.5513$_n$	9.1238	9.1313	9.5269$_n$	0.8740	9.9674	9.9964	9.5644
499	0.3339	8.3318	8.5512	8.8788$_n$	0.9311	9.9566	9.9504	9.4096
281	0.4853	6.5987	8.4791	8.7743$_n$	0.9573	9.9504	9.6489	7.7743
500	0.1429	8.7328	8.8129	9.0040$_n$	1.0357	9.9247	9.9732	9.6535
606	0.5221	7.9174$_n$	8.5715	8.7582$_n$	1.0389	9.9233	9.3750	9.0826$_n$
608	0.5279	8.0009$_n$	8.5853	8.7584$_n$	1.0483	9.9192	9.3068	9.1617$_n$
609	0.5350	8.1065$_n$	8.6134	8.7550$_n$	1.0695	9.9090	9.2036	9.2605$_n$
503	0.4614	7.8536	8.6252	8.7232$_n$	1.0972	9.8930	9.7480	9.0234
295	0.4476	8.0490	8.6439	8.7244$_n$	1.1077	9.8860	9.7889	9.2106
296	0.4450	8.0876	8.6534	8.7214$_n$	1.1149	9.8809	9.7952	9.2470
505	0.1758	8.8298	8.9050	8.9700$_n$	1.1167	9.8796	9.9405	9.7393
509	0.4112$_n$	9.4197	9.4262	9.4563$_n$	1.1360	9.8640	9.9000	9.8275
301	0.3384	8.6538	8.8157	8.8105$_n$	1.1542	9.8469	9.9024	9.6902
511	0.1845	8.9216	8.9860	8.9506$_n$	1.1686	9.8311	9.9053	9.8021
305	0.3765	8.5800	8.7943	8.7530$_n$	1.1713	9.8279	9.8775	9.6548
513	0.3438	8.7340	8.8763	8.7775$_n$	1.1954	9.7946	9.8749	9.7510
613	0.5207	8.2182$_n$	8.7497	8.6162$_n$	1.2083	9.7727	9.3808	9.3746$_n$
515	0.2695	8.9200	8.9962	8.8578$_n$	1.2100	9.7694	9.8630	9.8317
310	0.4334	8.4101	8.7810	8.6254$_n$	1.2158	9.7580	9.8037	9.5427
516	9.9396	9.1975	9.2222	9.0655$_n$	1.2162	9.7573	9.8341	9.8893
614	0.5095	8.0596$_n$	8.7482	8.5884$_n$	1.2173	9.7552	9.4886	9.2264$_n$
519	0.4652	8.1084	8.7680	8.5454$_n$	1.2356	9.7108	9.7290	9.2739
312	0.4423	8.4301	8.8064	8.5570$_n$	1.2423	9.6908	9.7781	9.5640
313	0.4248	8.5741	8.8416	8.5814$_n$	1.2449	9.6825	9.7960	9.6753
523	0.4701	8.0948	8.7874	8.4722$_n$	1.2564	9.6391	9.7103	9.2618
318	0.3461	8.9887	9.0607	8.7014$_n$	1.2642	9.6027	9.7558	9.8900
525	0.1599	9.3104	9.3295	8.9285$_n$	1.2704	9.5672	9.6804	9.9491
527	0.3265	9.0877	9.1375	8.7264$_n$	1.2717	9.5584	9.7151	9.9197
528	0.4265	8.7405	8.9209	8.4837$_n$	1.2749	9.5355	9.7422	9.7924
617	0.5026	8.2002$_n$	8.8132	8.3476$_n$	1.2781	9.5104	9.5337	9.3629$_n$
324	0.4596	8.4507	8.8400	8.3690$_n$	1.2786	9.5056	9.7216	9.5872
330	0.4856	7.4953	8.8148	8.1415$_n$	1.2926	9.3172	9.6466	8.6710
532	0.4736	8.4424	8.8530	8.0938$_n$	1.2957	9.2344	9.6687	9.5830
536	0.4721	8.5950	8.8859	8.0185$_n$	1.2982	9.1286	9.6449	9.7051
331	0.4638	8.8349	8.9785	8.0554$_n$	1.2991	9.0739	9.5876	9.8533
335	0.4678	8.8031	8.9630	7.9921$_n$	1.2997	9.0267	9.5874	9.8377
539	0.4740	9.0102	9.0868	7.7488$_n$	1.3017	8.6615	9.4394	9.9229

Allgemeine Praecession $= 50''.257$

$$\begin{aligned} A &= t - 0.02526 \sin 2 \odot \\ &\quad + 0.00293 \sin(\odot + 81^\circ\, 56') \\ &\quad - 0.34210 \sin \Omega \\ &\quad + 0.00409 \sin 2 \Omega \end{aligned}$$

$$\begin{aligned} [A' &= - 0.00405 \sin 2 ☾ \\ &\quad + 0.00134 \sin(☾ - 76^\circ\, 5')] \end{aligned}$$

$$\begin{aligned} B &= - 0''.5519 \cos 2 \odot \\ &\quad - 0.0092 \cos(\odot + 281^\circ\, 15') \\ &\quad - 9.2100 \cos \Omega \\ &\quad + 0.0895 \cos 2 \Omega \end{aligned}$$

$$[B' = - 0.0884 \cos 2 ☾]$$

$$C = - 20''.47 \cos \odot \cos \varepsilon$$

$$D = - 20''.47 \sin \odot$$

$$\begin{aligned} E &= - 0''.0031 \sin 2 \odot \\ &\quad - 0.0426 \sin \Omega \\ &\quad + 0.0014 \sin 2 \Omega \end{aligned}$$

$$\begin{aligned} a &= 46''.0856 + 20''.0466 \sin \alpha \operatorname{tg} \delta & a' &= 20''.0466 \cos \alpha \\ b &= \cos \alpha \operatorname{tg} \delta & b' &= - \sin \alpha \\ c &= \cos \alpha \sec \delta & c' &= \operatorname{tg} \varepsilon \cos \delta - \sin \alpha \sin \delta \\ d &= \sin \alpha \sec \delta & d' &= \cos \alpha \sin \delta \end{aligned}$$

$\odot$ = wahre Länge der Sonne

Ω = Länge des aufsteigenden Knotens der Mondbahn auf der Ekliptik

☾ = mittlere Länge des Mondes

m, m' = jährliche Eigen-Bewegung in AR. und Decl.

t = Zeit seit Anfang des Jahres, in Theilen des Jahres ausgedrückt.

$$\text{AR. app.} = \text{AR. } 1902.0 + tm + Aa + Bb + Cc + Dd + E + [A'a + B'b]$$

$$\text{Decl. app.} = \text{Decl. } 1902.0 + tm' + Aa' + Bb' + Cc' + Dd' + [A'a' + B'b']$$

Setzt man

$$\begin{aligned} f &= 46''.0856\, A + E & h \sin H &= C \\ g \cos G &= 20''.0466\, A & h \cos H &= D \\ g \sin G &= B & i &= C \operatorname{tg} \varepsilon \\ [f' &= 46''.0856\, A'] \\ [g' \cos G' &= 20''.0466\, A'] \\ [g' \sin G' &= B'], \end{aligned}$$

so wird

$$\text{AR. app.} = \text{AR. } 1902.0 + tm + f + g \sin(G + \alpha) \operatorname{tg} \delta + h \sin(H + \alpha) \sec \delta + [f' + g' \sin(G' + \alpha) \operatorname{tg} \delta]$$

$$\text{Decl. app.} = \text{Decl. } 1902.0 + tm' + g \cos(G + \alpha) + h \cos(H + \alpha) \sin \delta + i \cos \delta + [g' \cos(G' + \alpha)]$$

Correction für die tägliche Aberration, wenn Θ die Sternzeit, φ die Polhöhe ist:

$$\Delta \alpha = + 0^s.0214 \cos \varphi \cos(\Theta - \alpha) \sec \delta = \pm [8.1379]^s \sec \delta$$

$$\Delta \delta = + 0''.321 \cos \varphi \sin(\Theta - \alpha) \sin \delta.$$

Constanten für die Sternzeit-Epochen

$18^h\ 40^m$ des Normal-Meridians oder $14^h\ 42^m$ Berlin,

ohne Berücksichtigung der von der Mondlänge abhängenden Glieder der Nutation.

Datum in Mittl. Zeit.	t	log. A	log. B	log. C	log. D	E
1902 Jan. 0.83	0.000	9.3708	0.8778	0.5117$_n$	1.3045	″ +0.03
10.81	0.027	9.4281	0.8753	0.8104$_n$	1.2838	0.03
20.78	0.055	9.4756	0.8698	0.9763$_n$	1.2474	0.03
30.75	0.082	9.5148	0.8622	1.0855$_n$	1.1927	0.03
Febr. 9.73	0.109	9.5469	0.8537	1.1612$_n$	1.1144	0.03
19.70	0.137	9.5732	0.8459	1.2138$_n$	1.0022	+0.03
März 1.67	0.164	9.5950	0.8401	1.2483$_n$	0.8319	0.03
11.64	0.191	9.6137	0.8375	1.2678$_n$	0.5241	0.03
21.62	0.218	9.6305	0.8388	1.2737$_n$	9.2723$_n$	0.03
31.59	0.246	9.6467	0.8442	1.2665$_n$	0.5673$_n$	0.03
April 10.56	0.273	9.6633	0.8531	1.2461$_n$	0.8493$_n$	+0.02
20.53	0.300	9.6809	0.8647	1.2114$_n$	1.0095$_n$	0.02
30.51	0.328	9.6999	0.8777	1.1601$_n$	1.1161$_n$	0.02
Mai 10.48	0.355	9.7204	0.8909	1.0879$_n$	1.1910$_n$	0.02
20.45	0.382	9.7421	0.9032	0.9865$_n$	1.2438$_n$	0.02
30.42	0.410	9.7646	0.9135	0.8378$_n$	1.2798$_n$	+0.02
Juni 9.40	0.437	9.7873	0.9213	0.5900$_n$	1.3016$_n$	0.02
19.37	0.464	9.8095	0.9260	9.9013$_n$	1.3107$_n$	0.02
29.34	0.491	9.8308	0.9276	0.3645	1.3078$_n$	0.02
Juli 9.32	0.519	9.8507	0.9262	0.7292	1.2927$_n$	0.02
19.29	0.546	9.8688	0.9221	0.9170	1.2644$_n$	+0.02
29.26	0.573	9.8850	0.9160	1.0390	1.2211$_n$	0.02
Aug. 8.23	0.601	9.8992	0.9088	1.1245	1.1593$_n$	0.02
18.21	0.628	9.9114	0.9013	1.1857	1.0724$_n$	0.02
28.18	0.655	9.9220	0.8948	1.2287	0.9472$_n$	0.02
Sept. 7.15	0.683	9.9312	0.8903	1.2566	0.7507$_n$	+0.02
17.12	0.710	9.9394	0.8887	1.2711	0.3489$_n$	0.02
27.10	0.737	9.9473	0.8905	1.2729	0.0966	0.02
Oct. 7.07	0.765	9.9551	0.8957	1.2618	0.6734	0.02
17.04	0.792	9.9635	0.9040	1.2371	0.9064	0.02
27.02	0.819	9.9727	0.9145	1.1967	1.0486	+0.02
Nov. 5.99	0.846	9.9830	0.9262	1.1371	1.1457	0.02
15.96	0.874	9.9944	0.9377	1.0518	1.2142	0.02
25.93	0.901	0.0069	0.9481	0.9276	1.2618	0.02
Dec. 5.91	0.928	0.0200	0.9562	0.7316	1.2924	0.02
15.88	0.956	0.0335	0.9614	0.3302	1.3083	+0.02
25.85	0.983	0.0468	0.9634	0.0736$_n$	1.3103	0.02
35.82	1.010	0.0596	0.9622	0.6507$_n$	1.2984	0.02

Constanten für die mittleren Tage 1902,

ohne Berücksichtigung der von der Mondlänge abhängenden Glieder der Nutation.

12ʰ Mittl. Zeit	f	log. g	G	log. h	H	log. i	☾
Jan. 0	+10.80″	0.9486	58° 10′	1.3101	351° 10′	0.1340ₙ	487
1	10.95	0.9503	57 47	1.3099	350 13	0.1773ₙ	523
2	11.11	0.9520	57 25	1.3097	349 17	0.2166ₙ	560
3	11.26	0.9537	57 3	1.3095	348 21	0.2524ₙ	597
4	11.42	0.9553	56 41	1.3092	347 24	0.2854ₙ	633
5	+11.57	0.9569	56 19	1.3089	346 27	0.3159ₙ	670
6	11.73	0.9585	55 57	1.3086	345 31	0.3443ₙ	707
7	11.88	0.9601	55 35	1.3082	344 34	0.3708ₙ	743
8	12.03	0.9617	55 13	1.3079	343 37	0.3957ₙ	780
9	12.18	0.9632	54 52	1.3075	342 40	0.4191ₙ	816
10	+12.33	0.9647	54 31	1.3071	341 43	0.4411ₙ	853
11	12.48	0.9662	54 10	1.3067	340 45	0.4620ₙ	890
12	12.63	0.9677	53 49	1.3063	339 48	0.4817ₙ	926
13	12.78	0.9692	53 28	1.3059	338 51	0.5005ₙ	963
14	12.92	0.9706	53 7	1.3054	337 53	0.5184ₙ	999
15	+13.07	0.9720	52 47	1.3049	336 56	0.5354ₙ	036
16	13.21	0.9734	52 27	1.3044	335 58	0.5517ₙ	073
17	13.35	0.9748	52 7	1.3039	335 0	0.5672ₙ	109
18	13.49	0.9761	51 47	1.3034	334 2	0.5820ₙ	146
19	13.63	0.9774	51 27	1.3029	333 4	0.5963ₙ	182
20	+13.77	0.9787	51 7	1.3023	332 6	0.6099ₙ	219
21	13.91	0.9800	50 48	1.3018	331 7	0.6230ₙ	256
22	14.04	0.9813	50 29	1.3012	330 9	0.6356ₙ	292
23	14.18	0.9826	50 10	1.3006	329 10	0.6477ₙ	329
24	14.31	0.9838	49 51	1.3000	328 11	0.6593ₙ	365
25	+14.44	0.9850	49 32	1.2994	327 12	0.6705ₙ	402
26	14.57	0.9862	49 14	1.2988	326 13	0.6812ₙ	439
27	14.70	0.9874	48 56	1.2982	325 14	0.6916ₙ	475
28	14.83	0.9886	48 38	1.2976	324 14	0.7016ₙ	512
29	14.96	0.9898	48 20	1.2970	323 15	0.7112ₙ	548
30	+15.08	0.9909	48 3	1.2963	322 15	0.7205ₙ	585
31	15.20	0.9920	47 46	1.2957	321 15	0.7295ₙ	622
Febr. 1	15.32	0.9931	47 29	1.2950	320 15	0.7381ₙ	658
2	15.44	0.9942	47 12	1.2944	319 15	0.7464ₙ	695
3	15.56	0.9953	46 56	1.2937	318 14	0.7544ₙ	731
4	+15.68	0.9964	46 40	1.2930	317 14	0.7622ₙ	768
5	15.80	0.9975	46 24	1.2924	316 13	0.7697ₙ	805
6	15.91	0.9986	46 8	1.2917	315 12	0.7769ₙ	841

Constanten für die mittleren Tage 1902,

ohne Berücksichtigung der von der Mondlänge abhängenden Glieder der Nutation.

12ʰ Mittl. Zeit	f	log. g	G	log. h	H	log. i	☾
Febr. 6	+15″.91	0.9986	46° 8′	1.2917	315° 12′	0.7769_n	841
7	16.02	0.9996	45 52	1.2911	314 11	0.7839_n	878
8	16.13	1.0007	45 37	1.2904	313 10	0.7906_n	914
9	16.24	1.0017	45 22	1.2897	312 9	0.7971_n	951
10	16.35	1.0027	45 7	1.2891	311 7	0.8034_n	988
11	+16.46	1.0037	44 52	1.2884	310 5	0.8094_n	024
12	16.57	1.0047	44 38	1.2878	309 3	0.8152_n	061
13	16.67	1.0057	44 24	1.2871	308 1	0.8208_n	097
14	16.77	1.0067	44 10	1.2865	306 59	0.8262_n	134
15	16.87	1.0076	43 57	1.2859	305 57	0.8314_n	171
16	+16.97	1.0086	43 44	1.2852	304 54	0.8364_n	207
17	17.07	1.0095	43 31	1.2846	303 52	0.8412_n	244
18	17.17	1.0105	43 18	1.2840	302 49	0.8458_n	280
19	17.26	1.0114	43 6	1.2834	301 46	0.8502_n	317
20	17.36	1.0124	42 54	1.2829	300 43	0.8545_n	354
21	+17.45	1.0133	42 42	1.2823	299 40	0.8586_n	390
22	17.54	1.0143	42 30	1.2817	298 36	0.8625_n	427
23	17.63	1.0152	42 19	1.2812	297 33	0.8662_n	463
24	17.72	1.0162	42 8	1.2806	296 29	0.8698_n	500
25	17.81	1.0171	41 57	1.2801	295 26	0.8732_n	537
26	+17.90	1.0181	41 46	1.2796	294 22	0.8764_n	573
27	17.98	1.0190	41 36	1.2791	293 18	0.8795_n	610
28	18.07	1.0200	41 26	1.2787	292 14	0.8824_n	646
März 1	18.15	1.0209	41 16	1.2782	291 9	0.8852_n	683
2	18.24	1.0218	41 7	1.2778	290 5	0.8878_n	720
3	+18.32	1.0227	40 58	1.2774	289 1	0.8903_n	756
4	18.40	1.0236	40 49	1.2770	287 56	0.8926_n	793
5	18.48	1.0246	40 40	1.2766	286 51	0.8948_n	829
6	18.56	1.0255	40 32	1.2763	285 47	0.8968_n	866
7	18.64	1.0265	40 24	1.2759	284 42	0.8987_n	903
8	+18.72	1.0275	40 16	1.2756	283 37	0.9005_n	939
9	18.80	1.0285	40 8	1.2753	282 33	0.9021_n	976
10	18.88	1.0295	40 0	1.2750	281 28	0.9036_n	012
11	18.95	1.0305	39 53	1.2748	280 23	0.9049_n	049
12	19.03	1.0315	39 46	1.2746	279 18	0.9061_n	086
13	+19.10	1.0325	39 39	1.2744	278 13	0.9072_n	122
14	19.18	1.0335	39 32	1.2742	277 8	0.9081_n	159
15	19.25	1.0346	39 26	1.2741	276 3	0.9089_n	195

Constanten für die mittleren Tage 1902,

ohne Berücksichtigung der von der Mondlänge abhängenden Glieder der Nutation.

12h Mittl. Zeit	f	log. g	G	log. h	H	log. i	☾
März 15	+19.25″	1.0346	39° 26′	1.2741	276° 3′	0.9089n	195
16	19.33	1.0356	39 20	1.2739	274 58	0.9096n	232
17	19.40	1.0367	39 14	1.2738	273 53	0.9101n	269
18	19.48	1.0378	39 8	1.2738	272 48	0.9105n	305
19	19.55	1.0389	39 3	1.2737	271 43	0.9108n	342
20	+19.62	1.0400	38 58	1.2737	270 38	0.9109n	378
21	19.70	1.0411	38 53	1.2737	269 33	0.9109n	415
22	19.77	1.0422	38 48	1.2737	268 28	0.9108n	452
23	19.85	1.0434	38 43	1.2737	267 23	0.9106n	488
24	19.92	1.0445	38 38	1.2738	266 19	0.9102n	525
25	+20.00	1.0457	38 33	1.2739	265 14	0.9097n	561
26	20.07	1.0469	38 29	1.2740	264 9	0.9091n	598
27	20.15	1.0481	38 25	1.2742	263 5	0.9083n	635
28	20.22	1.0493	38 21	1.2743	262 0	0.9074n	671
29	20.30	1.0505	38 17	1.2745	260 56	0.9064n	708
30	+20.37	1.0518	38 13	1.2747	259 52	0.9052n	744
31	20.45	1.0531	38 10	1.2750	258 47	0.9039n	781
April 1	20.52	1.0544	38 6	1.2752	257 43	0.9025n	818
2	20.60	1.0557	38 3	1.2755	256 39	0.9009n	854
3	20.68	1.0570	38 0	1.2758	255 35	0.8992n	891
4	+20.76	1.0584	37 57	1.2761	254 32	0.8974n	927
5	20.84	1.0598	37 54	1.2765	253 28	0.8954n	964
6	20.92	1.0612	37 51	1.2768	252 25	0.8933n	001
7	21.00	1.0626	37 48	1.2772	251 21	0.8911n	037
8	21.08	1.0640	37 46	1.2776	250 18	0.8887n	074
9	+21.16	1.0654	37 43	1.2780	249 15	0.8862n	110
10	21.24	1.0668	37 41	1.2785	248 12	0.8835n	147
11	21.32	1.0683	37 38	1.2789	247 10	0.8807n	184
12	21.41	1.0698	37 36	1.2794	246 7	0.8778n	220
13	21.49	1.0713	37 33	1.2799	245 5	0.8747n	257
14	+21.58	1.0728	37 31	1.2804	244 3	0.8715n	293
15	21.67	1.0743	37 29	1.2809	243 1	0.8681n	330
16	21.76	1.0759	37 27	1.2814	241 59	0.8646n	367
17	21.85	1.0774	37 24	1.2819	240 57	0.8609n	403
18	21.94	1.0790	37 22	1.2825	239 56	0.8570n	440
19	+22.03	1.0806	37 20	1.2830	238 55	0.8530n	476
20	22.12	1.0822	37 18	1.2836	237 54	0.8488n	513
21	22.21	1.0838	37 16	1.2842	236 53	0.8445n	550

Constanten für die mittleren Tage 1902,

ohne Berücksichtigung der von der Mondlänge abhängenden Glieder der Nutation.

12h Mittl. Zeit		f	log. g	G	log. h	H	log. i	☾
April	21	+22.21″	1.0838	37° 16′	1.2842	236° 53′	0.8445_n	550
	22	22.31	1.0855	37 14	1.2848	235 52	0.8400_n	586
	23	22.41	1.0872	37 12	1.2854	234 52	0.8353_n	623
	24	22.51	1.0889	37 9	1.2860	233 51	0.8304_n	659
	25	22.61	1.0906	37 7	1.2866	232 51	0.8254_n	696
	26	+22.71	1.0923	37 5	1.2872	231 51	0.8202_n	733
	27	22.81	1.0940	37 3	1.2878	230 52	0.8148_n	769
	28	22.91	1.0957	37 0	1.2885	229 52	0.8092_n	806
	29	23.01	1.0974	36 58	1.2891	228 53	0.8034_n	842
	30	23.11	1.0992	36 55	1.2897	227 54	0.7974_n	879
Mai	1	+23.22	1.1009	36 53	1.2903	226 55	0.7912_n	916
	2	23.33	1.1027	36 50	1.2910	225 56	0.7848_n	952
	3	23.44	1.1044	36 47	1.2916	224 58	0.7782_n	989
	4	23.55	1.1062	36 45	1.2922	224 0	0.7713_n	025
	5	23.66	1.1080	36 42	1.2929	223 2	0.7642_n	062
	6	+23.77	1.1098	36 39	1.2935	222 4	0.7569_n	099
	7	23.88	1.1116	36 36	1.2941	221 6	0.7493_n	135
	8	23.99	1.1134	36 33	1.2948	220 9	0.7415_n	172
	9	24.11	1.1152	36 30	1.2954	219 11	0.7334_n	208
	10	24.23	1.1171	36 27	1.2960	218 14	0.7250_n	245
	11	+24.35	1.1189	36 24	1.2966	217 17	0.7164_n	282
	12	24.47	1.1208	36 21	1.2972	216 21	0.7074_n	318
	13	24.59	1.1226	36 18	1.2978	215 24	0.6981_n	355
	14	24.72	1.1245	36 14	1.2984	214 28	0.6885_n	392
	15	24.84	1.1263	36 10	1.2990	213 31	0.6786_n	428
	16	+24.97	1.1282	36 7	1.2996	212 35	0.6683_n	465
	17	25.09	1.1300	36 3	1.3001	211 40	0.6576_n	501
	18	25.22	1.1319	35 59	1.3007	210 44	0.6465_n	538
	19	25.35	1.1338	35 55	1.3012	209 48	0.6351_n	575
	20	25.48	1.1356	35 51	1.3018	208 53	0.6232_n	611
	21	+25.61	1.1375	35 47	1.3023	207 58	0.6108_n	648
	22	25.74	1.1393	35 43	1.3028	207 3	0.5980_n	684
	23	25.87	1.1412	35 39	1.3033	206 8	0.5847_n	721
	24	26.01	1.1430	35 35	1.3038	205 13	0.5708_n	758
	25	26.14	1.1449	35 30	1.3043	204 19	0.5563_n	794
	26	+26.28	1.1467	35 25	1.3048	203 24	0.5412_n	831
	27	26.42	1.1485	35 20	1.3052	202 30	0.5254_n	867
	28	26.56	1.1504	35 16	1.3056	201 36	0.5090_n	904

Constanten für die mittleren Tage 1902,

ohne Berücksichtigung der von der Mondlänge abhängenden Glieder der Nutation.

12^h Mittl. Zeit		f	log. g	G	log. h	H	log. i	☾
Mai	28	+26.56″	1.1504	35° 16′	1.3056	201° 36′	0.5090_n	904
	29	26.70	1.1522	35 11	1.3061	200 42	0.4918_n	941
	30	26.84	1.1540	35 6	1.3065	199 48	0.4737_n	977
	31	26.98	1.1559	35 1	1.3069	198 54	0.4547_n	014
Juni	1	27.12	1.1577	34 56	1.3073	198 0	0.4347_n	050
	2	+27.26	1.1595	34 51	1.3076	197 6	0.4137_n	087
	3	27.41	1.1613	34 45	1.3080	196 13	0.3915_n	124
	4	27.55	1.1631	34 40	1.3083	195 19	0.3679_n	160
	5	27.70	1.1649	34 34	1.3086	194 26	0.3429_n	197
	6	27.84	1.1667	34 28	1.3089	193 33	0.3162_n	233
	7	+27.99	1.1684	34 22	1.3092	192 40	0.2876_n	270
	8	28.14	1.1702	34 16	1.3094	191 47	0.2569_n	307
	9	28.28	1.1719	34 10	1.3097	190 54	0.2237_n	343
	10	28.43	1.1737	34 4	1.3099	190 1	0.1877_n	380
	11	28.58	1.1754	33 58	1.3101	189 8	0.1483_n	416
	12	+28.72	1.1771	33 52	1.3103	188 15	0.1049_n	453
	13	28.87	1.1788	33 46	1.3105	187 22	0.0565_n	490
	14	29.02	1.1805	33 40	1.3106	186 30	0.0019_n	526
	15	29.17	1.1822	33 33	1.3107	185 37	9.9392_n	563
	16	29.32	1.1839	33 27	1.3108	184 44	9.8659_n	599
	17	+29.47	1.1855	33 20	1.3109	183 52	9.7775_n	636
	18	29.62	1.1872	33 13	1.3110	182 59	9.6661_n	673
	19	29.77	1.1888	33 6	1.3111	182 6	9.5176_n	709
	20	29.92	1.1904	32 59	1.3111	181 14	9.2847_n	746
	21	30.07	1.1920	32 52	1.3111	180 21	8.7559_n	782
	22	+30.22	1.1936	32 45	1.3111	179 29	8.8960	819
	23	30.37	1.1952	32 38	1.3111	178 36	9.3310	856
	24	30.52	1.1968	32 31	1.3111	177 44	9.5437	892
	25	30.67	1.1983	32 24	1.3110	176 51	9.6858	929
	26	30.82	1.1999	32 17	1.3109	175 59	9.7927	965
	27	+30.97	1.2014	32 9	1.3108	175 6	9.8783	002
	28	31.12	1.2029	32 2	1.3107	174 14	9.9497	039
	29	31.27	1.2044	31 55	1.3106	173 21	0.0108	075
	30	31.42	1.2059	31 48	1.3104	172 29	0.0642	112
Juli	1	31.56	1.2073	31 40	1.3103	171 36	0.1117	148
	2	+31.71	1.2088	31 33	1.3101	170 43	0.1544	185
	3	31.85	1.2102	31 25	1.3099	169 51	0.1932	222
	4	32.00	1.2116	31 18	1.3096	168 58	0.2287	258

Constanten für die mittleren Tage 1902,

ohne Berücksichtigung der von der Mondlänge abhängenden Glieder der Nutation.

12h Mittl. Zeit		f	log. g	G	log. h	H	log. i	☾
Juli	4	+32.00″	1.2116	31° 18′	1.3096	168° 58′	0.2287	258
	5	32.15	1.2130	31 10	1.3094	168 5	0.2614	295
	6	32.30	1.2144	31 3	1.3091	167 12	0.2916	331
	7	32.44	1.2158	30 55	1.3088	166 19	0.3198	368
	8	32.59	1.2172	30 48	1.3085	165 26	0.3462	405
	9	+32.73	1.2185	30 40	1.3082	164 33	0.3709	441
	10	32.88	1.2198	30 33	1.3079	163 39	0.3942	478
	11	33.02	1.2211	30 25	1.3076	162 46	0.4162	514
	12	33.16	1.2224	30 18	1.3072	161 53	0.4371	551
	13	33.30	1.2237	30 10	1.3068	160 59	0.4569	588
	14	+33.44	1.2250	30 3	1.3064	160 6	0.4756	624
	15	33.58	1.2262	29 55	1.3060	159 12	0.4935	661
	16	33.72	1.2275	29 47	1.3056	158 18	0.5106	697
	17	33.85	1.2287	29 39	1.3052	157 24	0.5269	734
	18	33.99	1.2299	29 31	1.3047	156 30	0.5425	771
	19	+34.12	1.2311	29 24	1.3043	155 36	0.5574	807
	20	34.26	1.2323	29 16	1.3038	154 42	0.5718	844
	21	34.39	1.2334	29 9	1.3033	153 47	0.5856	880
	22	34.52	1.2346	29 1	1.3028	152 53	0.5988	917
	23	34.65	1.2357	28 54	1.3023	151 58	0.6115	954
	24	+34.78	1.2368	28 46	1.3017	151 3	0.6237	990
	25	34.91	1.2379	28 39	1.3012	150 8	0.6355	027
	26	35.04	1.2390	28 32	1.3007	149 13	0.6469	063
	27	35.16	1.2401	28 24	1.3001	148 18	0.6579	100
	28	35.29	1.2411	28 17	1.2996	147 23	0.6684	137
	29	+35.41	1.2421	28 10	1.2990	146 27	0.6786	173
	30	35.53	1.2431	28 2	1.2984	145 31	0.6885	210
	31	35.66	1.2441	27 55	1.2978	144 35	0.6980	246
Aug.	1	35.78	1.2451	27 48	1.2972	143 39	0.7072	283
	2	35.90	1.2461	27 41	1.2966	142 43	0.7161	320
	3	+36.02	1.2471	27 34	1.2960	141 47	0.7247	356
	4	36.14	1.2480	27 27	1.2954	140 50	0.7330	393
	5	36.26	1.2489	27 20	1.2948	139 53	0.7411	429
	6	36.37	1.2498	27 13	1.2942	138 56	0.7489	466
	7	36.48	1.2507	27 6	1.2935	137 59	0.7564	503
	8	+36.59	1.2516	26 59	1.2929	137 2	0.7637	539
	9	36.70	1.2525	26 52	1.2923	136 4	0.7707	576
	10	36.81	1.2534	26 46	1.2917	135 7	0.7775	612

Constanten für die mittleren Tage 1902,

ohne Berücksichtigung der von der Mondlänge abhängenden Glieder der Nutation.

12^h Mittl. Zeit	f	log. g	G	log. h	H	log. i	☾
Aug. 10	+36.81″	1.2534	26° 46′	1.2917	135° 7′	0.7775	612
11	36.92	1.2543	26 40	1.2910	134 9	0.7841	649
12	37.02	1.2551	26 34	1.2904	133 11	0.7905	686
13	37.13	1.2560	26 28	1.2898	132 13	0.7966	722
14	37.23	1.2568	26 21	1.2892	131 14	0.8026	759
15	+37.33	1.2576	26 15	1.2885	130 16	0.8084	795
16	37.43	1.2584	26 9	1.2879	129 17	0.8139	832
17	37.53	1.2592	26 3	1.2873	128 18	0.8193	869
18	37.63	1.2600	25 57	1.2867	127 19	0.8245	905
19	37.73	1.2608	25 51	1.2861	126 19	0.8295	942
20	+37.82	1.2615	25 46	1.2855	125 20	0.8343	978
21	37.92	1.2623	25 40	1.2849	124 20	0.8390	015
22	38.01	1.2630	25 35	1.2843	123 20	0.8435	052
23	38.11	1.2638	25 30	1.2837	122 20	0.8478	088
24	38.20	1.2645	25 25	1.2832	121 19	0.8520	125
25	+38.29	1.2652	25 20	1.2826	120 19	0.8560	161
26	38.38	1.2659	25 15	1.2821	119 18	0.8598	198
27	38.47	1.2666	25 10	1.2815	118 17	0.8635	235
28	38.56	1.2673	25 5	1.2810	117 16	0.8671	271
29	38.65	1.2680	25 0	1.2805	116 15	0.8705	308
30	+38.73	1.2687	24 56	1.2800	115 14	0.8737	344
31	38.82	1.2694	24 51	1.2795	114 12	0.8768	381
Sept. 1	38.90	1.2701	24 47	1.2791	113 11	0.8798	418
2	38.98	1.2708	24 43	1.2786	112 9	0.8826	454
3	39.06	1.2715	24 39	1.2782	111 7	0.8853	491
4	+39.14	1.2722	24 35	1.2778	110 5	0.8879	527
5	39.22	1.2729	24 31	1.2774	109 2	0.8903	564
6	39.30	1.2736	24 27	1.2770	108 0	0.8925	601
7	39.38	1.2742	24 24	1.2766	106 58	0.8946	637
8	39.46	1.2749	24 20	1.2763	105 55	0.8966	674
9	+39.54	1.2755	24 17	1.2760	104 52	0.8984	710
10	39.62	1.2762	24 14	1.2757	103 49	0.9002	747
11	39.69	1.2768	24 11	1.2754	102 46	0.9018	784
12	39.77	1.2775	24 8	1.2751	101 43	0.9032	820
13	39.84	1.2781	24 5	1.2749	100 39	0.9046	857
14	+39.92	1.2788	24 2	1.2746	99 36	0.9058	893
15	39.99	1.2794	24 0	1.2744	98 32	0.9068	930
16	40.06	1.2801	23 57	1.2743	97 29	0.9078	967

Constanten für die mittleren Tage 1902,

ohne Berücksichtigung der von der Mondlänge abhängenden Glieder der Nutation.

12h Mittl. Zeit	f	log. g	G	log. h	H	log. i	☾
Sept. 16	+40.06″	1.2801	23° 57′	1.2743	97° 29′	0.9078	967
17	40.14	1.2807	23 55	1.2741	96 25	0.9086	003
18	40.21	1.2814	23 53	1.2740	95 21	0.9093	040
19	40.28	1.2821	23 51	1.2739	94 18	0.9099	076
20	40.36	1.2827	23 49	1.2738	93 14	0.9104	113
21	+40.43	1.2834	23 47	1.2737	92 10	0.9107	150
22	40.50	1.2841	23 45	1.2737	91 6	0.9109	186
23	40.57	1.2848	23 44	1.2737	90 2	0.9110	223
24	40.64	1.2855	23 42	1.2737	88 58	0.9109	259
25	40.71	1.2862	23 41	1.2737	87 54	0.9107	296
26	+40.78	1.2869	23 39	1.2738	86 49	0.9104	333
27	40.86	1.2876	23 38	1.2739	85 45	0.9099	369
28	40.93	1.2883	23 37	1.2740	84 41	0.9094	406
29	41.01	1.2890	23 36	1.2741	83 37	0.9087	442
30	41.08	1.2897	23 35	1.2743	82 33	0.9079	479
Oct. 1	+41.16	1.2905	23 34	1.2745	81 29	0.9069	516
2	41.23	1.2912	23 33	1.2747	80 25	0.9058	552
3	41.31	1.2920	23 32	1.2749	79 21	0.9046	589
4	41.38	1.2928	23 31	1.2751	78 16	0.9032	625
5	41.46	1.2936	23 31	1.2754	77 12	0.9017	662
6	+41.54	1.2944	23 31	1.2757	76 8	0.9001	699
7	41.61	1.2952	23 31	1.2760	75 4	0.8983	735
8	41.69	1.2960	23 30	1.2763	74 1	0.8964	772
9	41.77	1.2968	23 30	1.2767	72 57	0.8944	808
10	41.85	1.2976	23 30	1.2770	71 53	0.8922	845
11	+41.93	1.2984	23 30	1.2774	70 49	0.8899	882
12	42.01	1.2992	23 30	1.2778	69 46	0.8874	918
13	42.09	1.3001	23 30	1.2783	68 42	0.8848	955
14	42.17	1.3009	23 30	1.2787	67 39	0.8821	991
15	42.26	1.3018	23 30	1.2792	66 36	0.8792	028
16	+42.34	1.3027	23 31	1.2797	65 32	0.8761	065
17	42.43	1.3036	23 31	1.2802	64 29	0.8729	101
18	42.51	1.3045	23 31	1.2807	63 26	0.8695	138
19	42.60	1.3054	23 31	1.2812	62 23	0.8660	174
20	42.69	1.3063	23 32	1.2817	61 21	0.8623	211
21	+42.78	1.3072	23 32	1.2823	60 18	0.8584	248
22	42.87	1.3081	23 32	1.2829	59 16	0.8544	284
23	42.96	1.3091	23 32	1.2834	58 13	0.8502	321

Constanten für die mittleren Tage 1902,

ohne Berücksichtigung der von der Mondlänge abhängenden Glieder der Nutation.

12^h Mittl. Zeit	f	log. g	G	log. h	H	log. i	☾
Oct. 23	+42.96″	1.3091	23° 32′	1.2834	58° 13′	0.8502	321
24	43.05	1.3100	23 33	1.2840	57 11	0.8458	357
25	43.15	1.3110	23 33	1.2846	56 9	0.8412	394
26	43.24	1.3120	23 34	1.2852	55 7	0.8365	431
27	43.34	1.3130	23 34	1.2858	54 5	0.8315	467
28	+43.44	1.3140	23 35	1.2865	53 3	0.8264	504
29	43.54	1.3150	23 35	1.2871	52 2	0.8211	540
30	43.64	1.3160	23 36	1.2877	51 1	0.8156	577
31	43.74	1.3171	23 36	1.2884	49 59	0.8098	614
Nov. 1	43.84	1.3181	23 37	1.2890	48 58	0.8039	650
2	+43.95	1.3192	23 37	1.2897	47 57	0.7977	687
3	44.06	1.3203	23 37	1.2903	46 57	0.7913	723
4	44.17	1.3214	23 37	1.2910	45 56	0.7847	760
5	44.28	1.3225	23 38	1.2916	44 55	0.7778	797
6	44.39	1.3236	23 38	1.2923	43 55	0.7707	833
7	+44.50	1.3247	23 38	1.2930	42 55	0.7633	870
8	44.62	1.3258	23 38	1.2936	41 55	0.7557	906
9	44.73	1.3269	23 39	1.2943	40 55	0.7477	943
10	44.85	1.3281	23 39	1.2949	39 55	0.7395	980
11	44.97	1.3292	23 39	1.2956	38 55	0.7310	016
12	+45.09	1.3304	23 39	1.2962	37 56	0.7222	053
13	45.21	1.3316	23 39	1.2968	36 57	0.7131	089
14	45.33	1.3328	23 39	1.2975	35 58	0.7036	126
15	45.45	1.3340	23 39	1.2981	34 59	0.6937	163
16	45.58	1.3352	23 38	1.2987	34 0	0.6835	199
17	+45.70	1.3364	23 38	1.2993	33 1	0.6729	236
18	45.83	1.3376	23 38	1.2999	32 2	0.6619	272
19	45.96	1.3388	23 37	1.3005	31 4	0.6505	309
20	46.09	1.3400	23 36	1.3011	30 6	0.6386	346
21	46.22	1.3412	23 36	1.3016	29 7	0.6262	382
22	+46.36	1.3424	23 35	1.3022	28 9	0.6134	419
23	46.49	1.3436	23 35	1.3027	27 12	0.6000	455
24	46.63	1.3448	23 34	1.3033	26 14	0.5860	492
25	46.77	1.3460	23 33	1.3038	25 16	0.5714	529
26	46.91	1.3473	23 32	1.3043	24 19	0.5562	565
27	+47.05	1.3485	23 31	1.3048	23 21	0.5402	602
28	47.19	1.3498	23 30	1.3053	22 24	0.5235	638
29	47.33	1.3511	23 29	1.3057	21 27	0.5060	675

Constanten für die mittleren Tage 1902,

ohne Berücksichtigung der von der Mondlänge abhängenden Glieder der Nutation.

12^h Mittl. Zeit	f	log. g	G	log. h	H	log. i	☾
Nov. 29	+47.33	1.3511	23° 29′	1.3057	21° 27′	0.5060	675
30	47.48	1.3523	23 27	1.3062	20 30	0.4876	712
Dec. 1	47.62	1.3536	23 26	1.3066	19 32	0.4682	748
2	47.77	1.3548	23 24	1.3070	18 35	0.4478	785
3	47.92	1.3561	23 23	1.3074	17 39	0.4263	821
4	+48.07	1.3573	23 21	1.3078	16 42	0.4035	858
5	48.22	1.3586	23 19	1.3081	15 45	0.3792	895
6	48.37	1.3598	23 17	1.3085	14 48	0.3533	931
7	48.52	1.3610	23 15	1.3088	13 52	0.3257	968
8	48.67	1.3622	23 13	1.3091	12 55	0.2960	004
9	+48.82	1.3635	23 11	1.3094	11 59	0.2640	041
10	48.97	1.3647	23 9	1.3096	11 3	0.2293	078
11	49.12	1.3660	23 7	1.3099	10 6	0.1914	114
12	49.28	1.3672	23 4	1.3101	9 10	0.1497	151
13	49.43	1.3684	23 2	1.3103	8 14	0.1035	187
14	+49.58	1.3696	22 59	1.3105	7 18	0.0515	224
15	49.74	1.3708	22 56	1.3106	6 21	9.9924	261
16	49.89	1.3720	22 53	1.3108	5 25	9.9236	297
17	50.04	1.3731	22 50	1.3109	4 29	9.8417	334
18	50.20	1.3743	22 47	1.3110	3 33	9.7405	370
19	+50.35	1.3755	22 44	1.3110	2 37	9.6081	407
20	50.51	1.3767	22 41	1.3111	1 41	9.4165	444
21	50.67	1.3779	22 38	1.3111	0 45	9.0654	480
22	50.82	1.3790	22 34	1.3111	359 49	8.4564$_n$	517
23	50.98	1.3802	22 31	1.3111	358 53	9.2393$_n$	553
24	+51.14	1.3813	22 27	1.3111	357 57	9.5028$_n$	590
25	51.30	1.3824	22 24	1.3110	357 1	9.6657$_n$	627
26	51.45	1.3836	22 20	1.3109	356 4	9.7836$_n$	663
27	51.61	1.3847	22 16	1.3108	355 8	9.8762$_n$	700
28	51.76	1.3858	22 12	1.3107	354 12	9.9524$_n$	736
29	+51.92	1.3869	22 9	1.3106	353 16	0.0171$_n$	773
30	52.07	1.3880	22 5	1.3104	352 20	0.0732$_n$	810
31	52.23	1.3891	22 1	1.3102	351 23	0.1228$_n$	846
32	52.38	1.3902	21 57	1.3100	350 27	0.1672$_n$	883
33	52.54	1.3913	21 53	1.3098	349 30	0.2073$_n$	919
34	+52.69	1.3923	21 49	1.3095	348 34	0.2439$_n$	956
35	52.84	1.3934	21 45	1.3093	347 37	0.2776$_n$	993
36	52.99	1.3944	21 41	1.3090	346 41	0.3087$_n$	029

Constanten zur Berücksichtigung der Nutations-Glieder von kurzer Periode für 1902.

☾	log. A'	log. B'	f'	log. g'	G'	☾	log. A'	log. B'	f'	log. g'	G'
000	7.115_n	8.946_n	−0″.06	8.965	253°.5	350	7.688	8.436	+0″.22	9.006	15°.6
010	7.252_n	8.943_n	−0.08	8.977	247.8	360	7.703	8.219	+0.23	9.011	9.3
020	7.354_n	8.933_n	−0.10	8.986	242.2	370	7.713	7.744	+0.24	9.015	3.1
030	7.433_n	8.915_n	−0.12	8.993	236.6	380	7.717	7.744_n	+0.24	9.019	357.0
040	7.496_n	8.889_n	−0.14	8.999	231.0	390	7.715	8.219_n	+0.24	9.022	350.9
050	7.546_n	8.854_n	−0.16	9.002	225.4	400	7.707	8.436_n	+0.23	9.024	345.0
060	7.587_n	8.809_n	−0.18	9.003	219.8	410	7.693	8.576_n	+0.23	9.025	339.2
070	7.619_n	8.751_n	−0.19	9.003	214.1	420	7.673	8.675_n	+0.22	9.024	333.4
080	7.644_n	8.675_n	−0.20	9.001	208.2	430	7.647	8.751_n	+0.21	9.022	327.6
090	7.662_n	8.576_n	−0.21	8.997	202.2	440	7.613	8.809_n	+0.19	9.019	321.9
100	7.673_n	8.436_n	−0.22	8.993	196.1	450	7.570	8.854_n	+0.17	9.014	316.2
110	7.679_n	8.219_n	−0.22	8.987	189.8	460	7.517	8.889_n	+0.15	9.007	310.4
120	7.678_n	7.744_n	−0.22	8.981	183.3	470	7.452	8.915_n	+0.13	8.999	304.6
130	7.671_n	7.744	−0.22	8.974	176.6	480	7.369	8.933_n	+0.11	8.990	298.7
140	7.658_n	8.219	−0.21	8.967	169.7	490	7.262	8.943_n	+0.08	8.978	292.7
150	7.639_n	8.436	−0.20	8.961	162.6	500	7.115	8.946_n	+0.06	8.965	286.5
160	7.611_n	8.576	−0.19	8.955	155.3	510	6.888	8.943_n	+0.04	8.950	280.0
170	7.575_n	8.675	−0.17	8.950	147.8	520	6.390	8.933_n	+0.01	8.933	273.3
180	7.529_n	8.751	−0.16	8.945	140.2	530	6.431_n	8.915_n	−0.01	8.916	266.2
190	7.470_n	8.809	−0.14	8.942	132.5	540	6.885_n	8.889_n	−0.04	8.898	258.8
200	7.393_n	8.854	−0.11	8.940	124.7	550	7.093_n	8.854_n	−0.06	8.879	250.9
210	7.292_n	8.889	−0.09	8.939	116.9	560	7.224_n	8.809_n	−0.08	8.861	242.5
220	7.151_n	8.915	−0.07	8.939	109.1	570	7.317_n	8.751_n	−0.10	8.845	233.6
230	6.929_n	8.933	−0.04	8.941	101.3	580	7.385_n	8.675_n	−0.11	8.832	224.2
240	6.426_n	8.943	−0.01	8.944	93.5	590	7.437_n	8.576_n	−0.13	8.823	214.5
250	6.509	8.946	+0.02	8.948	85.8	600	7.475_n	8.436_n	−0.14	8.818	204.6
260	6.960	8.943	+0.04	8.952	78.2	610	7.502_n	8.219_n	−0.15	8.818	194.6
270	7.173	8.933	+0.07	8.957	70.8	620	7.520_n	7.744_n	−0.15	8.823	184.8
280	7.312	8.915	+0.10	8.963	63.4	630	7.529_n	7.744	−0.16	8.832	175.3
290	7.413	8.889	+0.12	8.970	56.2	640	7.530_n	8.219	−0.16	8.845	166.3
300	7.490	8.854	+0.14	8.976	49.1	650	7.524_n	8.436	−0.15	8.860	157.8
310	7.550	8.809	+0.16	8.982	42.2	660	7.510_n	8.576	−0.15	8.875	149.9
320	7.598	8.751	+0.18	8.988	35.3	670	7.487_n	8.675	−0.14	8.890	142.4
330	7.636	8.675	+0.20	8.995	28.6	680	7.455_n	8.751	−0.13	8.905	135.4
340	7.666	8.576	+0.21	9.001	22.1	690	7.413_n	8.809	−0.12	8.918	128.8
350	7.688	8.436	+0.22	9.006	15.6	700	7.358_n	8.854	−0.10	8.929	122.6

Constanten zur Berücksichtigung der Nutations-Glieder von kurzer Periode für 1902.

☾	log. A′	log. B′	f′	log. g′	G′	☾	log. A′	log. B′	f′	log. g′	G′
700	7.358_n	8.854	−0.″10	8.929	122.°6	850	7.450	8.436	+0.″13	8.798	25.°8
710	7.287_n	8.889	−0.08	8.938	116.6	860	7.462	8.219	+0.13	8.781	15.9
720	7.194_n	8.915	−0.07	8.944	110.8	870	7.464	7.744	+0.13	8.768	5.4
730	7.066_n	8.933	−0.05	8.948	105.2	880	7.457	7.744_n	+0.13	8.761	354.5
740	6.873_n	8.943	−0.03	8.949	99.7	890	7.442	8.219_n	+0.13	8.762	343.4
750	6.509_n	8.946	−0.01	8.948	94.2	900	7.416	8.436_n	+0.12	8.770	332.4
760	6.014	8.943	0.00	8.943	88.6	910	7.378	8.576_n	+0.11	8.785	321.8
770	6.718	8.933	+0.02	8.936	83.0	920	7.326	8.675_n	+0.10	8.804	311.9
780	6.968	8.915	+0.04	8.926	77.3	930	7.256	8.751_n	+0.08	8.826	302.7
790	7.118	8.889	+0.06	8.913	71.3	940	7.158	8.809_n	+0.07	8.849	294.1
800	7.222	8.854	+0.08	8.897	64.9	950	7.017	8.854_n	+0.05	8.872	286.2
810	7.299	8.809	+0.09	8.880	58.2	960	6.783	8.889_n	+0.03	8.894	278.9
820	7.356	8.751	+0.10	8.860	51.0	970	6.173	8.915_n	+0.01	8.915	272.1
830	7.399	8.675	+0.11	8.839	43.3	980	6.514_n	8.933_n	−0.02	8.934	265.6
840	7.430	8.576	+0.12	8.818	34.9	990	6.910_n	8.943_n	−0.04	8.951	259.4
850	7.450	8.436	+0.13	8.798	25.8	1000	7.115_n	8.946_n	−0.06	8.965	253.5

Correction der Schiefe der Ekliptik für die Glieder von kurzer Periode.

Argument ☾		Δε	Argument ☾		Δε	Argument ☾		Δε
000	500	+0.″09	200	700	−0.″07	400	900	+0.″03
020	520	+0.09	220	720	−0.08	420	920	+0.05
040	540	+0.08	240	740	−0.09	440	940	+0.07
060	560	+0.07	260	760	−0.09	460	960	+0.08
080	580	+0.05	280	780	−0.08	480	980	+0.09
100	600	+0.03	300	800	−0.07	500	000	+0.09
120	620	+0.01	320	820	−0.06			
140	640	−0.02	340	840	−0.04			
160	660	−0.04	360	860	−0.02			
180	680	−0.06	380	880	+0.01			
200	700	−0.07	400	900	+0.03			

Constanten für die Stern-Tage 1902,

gültig für die Sternzeit-Epochen $14^h\ 42^m.5$ Berlin.

Datum in Mittl. Zeit	t	log. A	log. B	log. C	log. D	C
Jan. 0.835	0.0000	9.3729	0.8726	0.5117_n	1.3045	−3.249
1.832	0.0027	9.3754	0.8731	0.5535_n	1.3031	3.577
2.830	0.0055	9.3785	0.8744	0.5914_n	1.3015	3.903
3.827	0.0082	9.3827	0.8764	0.6262_n	1.2998	4.229
4.824	0.0109	9.3882	0.8785	0.6582_n	1.2980	4.553
5.821	0.0136	9.3950	0.8803	0.6880_n	1.2960	−4.875
6.819	0.0164	9.4028	0.8814	0.7156_n	1.2938	5.196
7.816	0.0191	9.4111	0.8815	0.7416_n	1.2915	5.515
8.813	0.0218	9.4191	0.8805	0.7659_n	1.2891	5.833
9.811	0.0246	9.4263	0.8786	0.7888_n	1.2865	6.148
10.808	0.0273	9.4325	0.8760	0.8104_n	1.2838	−6.462
11.805	0.0300	9.4372	0.8733	0.8308_n	1.2809	
12.802	0.0328	9.4408	0.8708	0.8502_n	1.2778	
13.800	0.0355	9.4434	0.8691	0.8687_n	1.2746	
14.797	0.0382	9.4457	0.8683	0.8862_n	1.2712	
15.794	0.0410	9.4482	0.8686	0.9030_n	1.2677	
16.791	0.0437	9.4514	0.8697	0.9190_n	1.2640	
17.789	0.0464	9.4557	0.8714	0.9342_n	1.2601	
18.786	0.0491	9.4612	0.8731	0.9489_n	1.2560	
19.783	0.0519	9.4678	0.8743	0.9629_n	1.2518	
20.780	0.0546	9.4749	0.8748	0.9763_n	1.2474	
21.778	0.0573	9.4822	0.8742	0.9893_n	1.2428	
22.775	0.0601	9.4891	0.8725	1.0017_n	1.2380	
23.772	0.0628	9.4950	0.8699	1.0136_n	1.2331	
24.770	0.0655	9.4997	0.8669	1.0250_n	1.2280	
25.767	0.0683	9.5030	0.8638	1.0361_n	1.2226	
26.764	0.0710	9.5052	0.8612	1.0467_n	1.2170	
27.761	0.0737	9.5066	0.8594	1.0569_n	1.2113	
28.759	0.0764	9.5076	0.8587	1.0668_n	1.2053	
29.756	0.0792	9.5088	0.8590	1.0763_n	1.1991	
30.753	0.0819	9.5106	0.8602	1.0855_n	1.1927	
31.750	0.0846	9.5134	0.8617	1.0944_n	1.1860	
Febr. 1.748	0.0874	9.5172	0.8632	1.1029_n	1.1791	
2.745	0.0901	9.5218	0.8640	1.1111_n	1.1720	
3.742	0.0928	9.5270	0.8640	1.1191_n	1.1646	
4.740	0.0956	9.5323	0.8629	1.1268_n	1.1570	
5.737	0.0983	9.5372	0.8608	1.1341_n	1.1490	
6.734	0.1010	9.5413	0.8579	1.1413_n	1.1408	

$$E = +0''.03$$

Constanten für die Stern-Tage 1902,

gültig für die Sternzeit-Epochen $14^h\ 42^m.5$ Berlin.

Datum in Mittl. Zeit	t	log. A	log. B	log. C	log. D	D
Febr. 6.734	0.1010	9.5413	0.8579	1.1413_n	1.1408	
7.731	0.1038	9.5444	0.8546	1.1482_n	1.1323	
8.729	0.1065	9.5465	0.8515	1.1548_n	1.1235	
9.726	0.1092	9.5478	0.8490	1.1612_n	1.1144	
10.723	0.1120	9.5486	0.8474	1.1674_n	1.1049	
11.720	0.1147	9.5494	0.8470	1.1734_n	1.0951	
12.718	0.1174	9.5507	0.8477	1.1791_n	1.0850	
13.715	0.1201	9.5527	0.8491	1.1847_n	1.0744	
14.712	0.1229	9.5557	0.8507	1.1900_n	1.0635	
15.709	0.1256	9.5596	0.8522	1.1952_n	1.0521	
16.707	0.1283	9.5643	0.8530	1.2001_n	1.0404	
17.704	0.1311	9.5692	0.8527	1.2048_n	1.0281	
18.701	0.1338	9.5740	0.8514	1.2094_n	1.0154	
19.699	0.1365	9.5782	0.8491	1.2138_n	1.0022	
20.696	0.1393	9.5816	0.8461	1.2180_n	0.9883	
21.693	0.1420	9.5838	0.8430	1.2220_n	0.9740	
22.690	0.1447	9.5851	0.8401	1.2259_n	0.9590	
23.688	0.1474	9.5855	0.8381	1.2296_n	0.9433	
24.685	0.1502	9.5855	0.8371	1.2331_n	0.9269	
25.682	0.1529	9.5854	0.8373	1.2365_n	0.9097	
26.679	0.1556	9.5858	0.8385	1.2397_n	0.8917	
27.677	0.1584	9.5869	0.8404	1.2427_n	0.8728	
28.674	0.1611	9.5889	0.8424	1.2456_n	0.8529	
März 1.671	0.1638	9.5917	0.8441	1.2483_n	0.8319	
2.669	0.1666	9.5952	0.8449	1.2509_n	0.8098	+6.453
3.666	0.1693	9.5989	0.8447	1.2534_n	0.7863	+6.113
4.663	0.1720	9.6024	0.8435	1.2557_n	0.7613	5.772
5.660	0.1747	9.6054	0.8413	1.2578_n	0.7347	5.429
6.658	0.1775	9.6076	0.8386	1.2598_n	0.7062	5.084
7.655	0.1802	9.6090	0.8358	1.2617_n	0.6756	4.738
8.652	0.1829	9.6096	0.8336	1.2634_n	0.6426	+4.391
9.649	0.1857	9.6098	0.8323	1.2650_n	0.6067	4.043
10.647	0.1884	9.6098	0.8321	1.2665_n	0.5674	3.693
11.644	0.1911	9.6100	0.8332	1.2678_n	0.5241	3.343
12.641	0.1939	9.6108	0.8351	1.2690_n	0.4759	2.992
13.639	0.1966	9.6124	0.8376	1.2700_n	0.4216	+2.640
14.636	0.1993	9.6150	0.8401	1.2709_n	0.3594	2.288
15.633	0.2021	9.6183	0.8421	1.2717_n	0.2866	1.935

$E = +0\overset{s}{.}03$

Constanten für die Stern-Tage 1902,

gültig für die Sternzeit-Epochen $14^h\ 42^m.5$ Berlin.

Datum in Mittl. Zeit	t	log. A	log. B	log. C	log. D	D
März 15.633	0.2021	9.6183	0.8421	1.2717_n	0.2866	+1.935
16.630	0.2048	9.6221	0.8431	1.2724_n	0.1990	1.581
17.628	0.2075	9.6259	0.8431	1.2729_n	0.0891	1.228
18.625	0.2102	9.6294	0.8421	1.2733_n	9.9415	0.874
19.622	0.2130	9.6323	0.8402	1.2735_n	9.7162	0.520
20.619	0.2157	9.6343	0.8380	1.2737_n	9.2213	+0.166
21.617	0.2184	9.6354	0.8359	1.2737_n	9.2723_n	−0.187
22.614	0.2212	9.6356	0.8345	1.2735_n	9.7328_n	0.541
23.611	0.2239	9.6354	0.8340	1.2733_n	9.9511_n	0.894
24.608	0.2266	9.6351	0.8348	1.2729_n	0.0956_n	1.246
25.606	0.2294	9.6349	0.8367	1.2723_n	0.2036_n	−1.598
26.603	0.2321	9.6354	0.8394	1.2717_n	0.2899_n	1.949
27.600	0.2348	9.6366	0.8425	1.2709_n	0.3617_n	2.300
28.598	0.2375	9.6387	0.8454	1.2700_n	0.4231_n	2.649
29.595	0.2403	9.6414	0.8477	1.2690_n	0.4768_n	2.998
30.592	0.2430	9.6445	0.8490	1.2678_n	0.5245_n	−3.346
31.589	0.2457	9.6476	0.8492	1.2665_n	0.5673_n	3.692
April 1.587	0.2485	9.6504	0.8484	1.2651_n	0.6061_n	4.037
2.584	0.2512	9.6527	0.8469	1.2635_n	0.6416_n	4.381
3.581	0.2539	9.6542	0.8453	1.2618_n	0.6742_n	4.723
4.578	0.2567	9.6550	0.8439	1.2600_n	0.7045_n	−5.064
5.576	0.2594	9.6552	0.8433	1.2580_n	0.7326_n	5.403
6.573	0.2621	9.6553	0.8437	1.2559_n	0.7589_n	5.740
7.570	0.2649	9.6554	0.8453	1.2537_n	0.7835_n	6.075
8.568	0.2676	9.6560	0.8480	1.2513_n	0.8067_n	6.408
9.565	0.2703	9.6572	0.8513	1.2488_n	0.8286_n	
10.562	0.2730	9.6593	0.8548	1.2461_n	0.8493_n	
11.559	0.2758	9.6623	0.8579	1.2433_n	0.8690_n	
12.557	0.2785	9.6657	0.8603	1.2404_n	0.8876_n	
13.554	0.2812	9.6694	0.8617	1.2373_n	0.9054_n	
14.551	0.2840	9.6730	0.8620	1.2340_n	0.9223_n	
15.548	0.2867	9.6761	0.8614	1.2306_n	0.9385_n	
16.546	0.2894	9.6785	0.8603	1.2271_n	0.9539_n	
17.543	0.2922	9.6801	0.8591	1.2234_n	0.9687_n	
18.540	0.2949	9.6810	0.8583	1.2196_n	0.9829_n	
19.537	0.2976	9.6813	0.8584	1.2156_n	0.9965_n	
20.535	0.3003	9.6813	0.8595	1.2114_n	1.0095_n	
21.532	0.3031	9.6815	0.8617	1.2071_n	1.0221_n	

$E = +0.02$

Constanten für die Stern-Tage 1902,
gültig für die Sternzeit-Epochen $14^h\ 42^m.5$ Berlin.

Datum in Mittl. Zeit		t	log. A	log. B	log. C	log. D
April	21.532	0.3031	9.6815	0.8617	1.2071_n	1.0221_n
	22.529	0.3058	9.6821	0.8649	1.2026_n	1.0341_n
	23.527	0.3085	9.6833	0.8684	1.1979_n	1.0457_n
	24.524	0.3113	9.6853	0.8720	1.1930_n	1.0569_n
	25.521	0.3140	9.6880	0.8751	1.1880_n	1.0677_n
	26.518	0.3167	9.6911	0.8774	1.1828_n	1.0781_n
	27.516	0.3195	9.6944	0.8787	1.1774_n	1.0881_n
	28.513	0.3222	9.6976	0.8789	1.1718_n	1.0978_n
	29.510	0.3249	9.7003	0.8784	1.1661_n	1.1071_n
	30.507	0.3277	9.7024	0.8774	1.1601_n	1.1161_n
Mai	1.505	0.3304	9.7038	0.8766	1.1539_n	1.1248_n
	2.502	0.3331	9.7047	0.8762	1.1475_n	1.1332_n
	3.499	0.3358	9.7053	0.8767	1.1409_n	1.1413_n
	4.497	0.3386	9.7059	0.8782	1.1340_n	1.1492_n
	5.494	0.3413	9.7068	0.8808	1.1270_n	1.1567_n
	6.491	0.3440	9.7082	0.8841	1.1197_n	1.1640_n
	7.488	0.3468	9.7103	0.8876	1.1121_n	1.1711_n
	8.486	0.3495	9.7132	0.8911	1.1043_n	1.1780_n
	9.483	0.3522	9.7167	0.8939	1.0962_n	1.1846_n
	10.480	0.3550	9.7205	0.8958	1.0879_n	1.1910_n
	11.477	0.3577	9.7244	0.8967	1.0792_n	1.1971_n
	12.475	0.3604	9.7279	0.8967	1.0703_n	1.2031_n
	13.472	0.3631	9.7309	0.8960	1.0611_n	1.2088_n
	14.469	0.3659	9.7332	0.8951	1.0515_n	1.2144_n
	15.466	0.3686	9.7348	0.8943	1.0416_n	1.2198_n
	16.464	0.3713	9.7358	0.8941	1.0313_n	1.2249_n
	17.461	0.3741	9.7365	0.8948	1.0207_n	1.2299_n
	18.458	0.3768	9.7372	0.8965	1.0097_n	1.2347_n
	19.456	0.3795	9.7381	0.8991	0.9983_n	1.2394_n
	20.453	0.3823	9.7396	0.9022	0.9865_n	1.2438_n
	21.450	0.3850	9.7416	0.9056	0.9742_n	1.2481_n
	22.447	0.3877	9.7443	0.9086	0.9614_n	1.2523_n
	23.445	0.3904	9.7475	0.9109	0.9481_n	1.2562_n
	24.442	0.3932	9.7509	0.9123	0.9343_n	1.2601_n
	25.439	0.3959	9.7543	0.9127	0.9199_n	1.2637_n
	26.436	0.3986	9.7574	0.9123	0.9049_n	1.2672_n
	27.434	0.4014	9.7600	0.9113	0.8892_n	1.2706_n
	28.431	0.4041	9.7620	0.9101	0.8728_n	1.2738_n

$E = +0.02$

Constanten für die Stern-Tage 1902,

gültig für die Sternzeit-Epochen $14^h\ 42^m.5$ Berlin.

Datum in Mittl. Zeit	t	log. A	log. B	log. C	log. D	C
Mai 28.431	0.4041	9.7620	0.9101	0.8728$_n$	1.2738$_n$	−7.462
29.428	0.4068	9.7635	0.9093	0.8557$_n$	1.2769$_n$	7.173
30.426	0.4096	9.7646	0.9091	0.8378$_n$	1.2798$_n$	6.883
31.423	0.4123	9.7655	0.9098	0.8189$_n$	1.2826$_n$	6.590
Juni 1.420	0.4150	9.7667	0.9114	0.7991$_n$	1.2852$_n$	6.296
2.417	0.4178	9.7682	0.9138	0.7782$_n$	1.2877$_n$	−6.000
3.415	0.4205	9.7703	0.9167	0.7561$_n$	1.2901$_n$	5.703
4.412	0.4232	9.7730	0.9196	0.7327$_n$	1.2923$_n$	5.404
5.409	0.4259	9.7763	0.9220	0.7079$_n$	1.2945$_n$	5.104
6.406	0.4287	9.7799	0.9237	0.6814$_n$	1.2964$_n$	4.802
7.404	0.4314	9.7837	0.9245	0.6532$_n$	1.2983$_n$	−4.499
8.401	0.4341	9.7873	0.9242	0.6228$_n$	1.3000$_n$	4.195
9.398	0.4369	9.7906	0.9233	0.5900$_n$	1.3016$_n$	3.890
10.396	0.4396	9.7932	0.9218	0.5544$_n$	1.3031$_n$	3.584
11.393	0.4423	9.7952	0.9204	0.5155$_n$	1.3044$_n$	3.277
12.390	0.4451	9.7966	0.9193	0.4726$_n$	1.3056$_n$	−2.969
13.387	0.4478	9.7977	0.9190	0.4249$_n$	1.3067$_n$	2.660
14.385	0.4505	9.7986	0.9196	0.3713$_n$	1.3077$_n$	2.351
15.382	0.4532	9.7996	0.9211	0.3099$_n$	1.3085$_n$	2.041
16.379	0.4560	9.8009	0.9232	0.2382$_n$	1.3093$_n$	1.730
17.376	0.4587	9.8028	0.9257	0.1521$_n$	1.3099$_n$	−1.419
18.374	0.4614	9.8052	0.9280	0.0446$_n$	1.3104$_n$	1.108
19.371	0.4642	9.8081	0.9298	9.9013$_n$	1.3107$_n$	0.797
20.368	0.4669	9.8112	0.9308	9.6858$_n$	1.3110$_n$	0.485
21.365	0.4696	9.8144	0.9309	9.2389$_n$	1.3111$_n$	−0.173
22.363	0.4724	9.8174	0.9300	9.1415	1.3111$_n$	+0.139
23.360	0.4751	9.8201	0.9284	9.6534	1.3110$_n$	0.450
24.357	0.4778	9.8222	0.9265	9.8818	1.3108$_n$	0.762
25.355	0.4806	9.8238	0.9247	0.0306	1.3104$_n$	1.073
26.352	0.4833	9.8250	0.9235	0.1412	1.3099$_n$	1.384
27.349	0.4860	9.8260	0.9230	0.2291	1.3093$_n$	+1.695
28.346	0.4887	9.8269	0.9234	0.3021	1.3086$_n$	2.005
29.344	0.4915	9.8282	0.9247	0.3645	1.3078$_n$	2.315
30.341	0.4942	9.8298	0.9265	0.4189	1.3068$_n$	2.623
Juli 1.338	0.4969	9.8321	0.9286	0.4671	1.3058$_n$	2.932
2.335	0.4997	9.8348	0.9303	0.5104	1.3046$_n$	+3.239
3.333	0.5024	9.8379	0.9315	0.5496	1.3032$_n$	3.545
4.330	0.5051	9.8413	0.9318	0.5856	1.3018$_n$	3.851

$E = +0\overset{s}{.}02$

Constanten für die Stern-Tage 1902,

gültig für die Sternzeit-Epochen $14^h\ 42^m.5$ Berlin.

Datum in Mittl. Zeit		t	log. A	log. B	log. C	log. D	C
Juli	4.330	0.5051	9.8413	0.9318	0.5856	1.3018_n	+3.851
	5.327	0.5079	9.8445	0.9311	0.6186	1.3002_n	4.155
	6.325	0.5106	9.8475	0.9296	0.6492	1.2985_n	4.459
	7.322	0.5133	9.8500	0.9275	0.6777	1.2967_n	4.761
	8.319	0.5160	9.8519	0.9252	0.7043	1.2947_n	5.061
	9.316	0.5188	9.8533	0.9231	0.7292	1.2927_n	+5.361
	10.314	0.5215	9.8543	0.9216	0.7527	1.2904_n	5.659
	11.311	0.5242	9.8550	0.9210	0.7749	1.2881_n	5.955
	12.308	0.5270	9.8557	0.9213	0.7959	1.2856_n	6.250
	13.305	0.5297	9.8567	0.9224	0.8158	1.2830_n	6.543
	14.303	0.5324	9.8580	0.9240	0.8347	1.2803_n	
	15.300	0.5352	9.8598	0.9256	0.8527	1.2774_n	
	16.297	0.5379	9.8621	0.9269	0.8699	1.2744_n	
	17.294	0.5406	9.8646	0.9275	0.8863	1.2712_n	
	18.292	0.5433	9.8673	0.9271	0.9020	1.2679_n	
	19.289	0.5461	9.8698	0.9258	0.9170	1.2644_n	
	20.286	0.5488	9.8721	0.9238	0.9315	1.2608_n	
	21.284	0.5515	9.8739	0.9212	0.9453	1.2570_n	
	22.281	0.5543	9.8753	0.9186	0.9586	1.2531_n	
	23.278	0.5570	9.8762	0.9163	0.9714	1.2490_n	
	24.275	0.5597	9.8769	0.9147	0.9837	1.2448_n	
	25.273	0.5625	9.8775	0.9141	0.9956	1.2404_n	
	26.270	0.5652	9.8782	0.9144	1.0070	1.2359_n	
	27.267	0.5679	9.8793	0.9155	1.0181	1.2311_n	
	28.264	0.5707	9.8808	0.9169	1.0287	1.2262_n	
	29.262	0.5734	9.8827	0.9182	1.0390	1.2211_n	
	30.259	0.5761	9.8851	0.9191	1.0489	1.2159_n	
	31.256	0.5789	9.8877	0.9192	1.0584	1.2104_n	
Aug.	1.254	0.5816	9.8904	0.9184	1.0677	1.2047_n	
	2.251	0.5843	9.8928	0.9166	1.0767	1.1989_n	
	3.248	0.5870	9.8950	0.9141	1.0853	1.1928_n	
	4.245	0.5898	9.8966	0.9112	1.0937	1.1866_n	
	5.243	0.5925	9.8977	0.9085	1.1018	1.1801_n	
	6.240	0.5952	9.8984	0.9062	1.1096	1.1734_n	
	7.237	0.5980	9.8988	0.9048	1.1172	1.1665_n	
	8.234	0.6007	9.8990	0.9043	1.1245	1.1593_n	
	9.232	0.6034	9.8994	0.9048	1.1316	1.1519_n	
	10.229	0.6062	9.9001	0.9059	1.1384	1.1442_n	

$E = +0\overset{s}{.}02$

Constanten für die Stern-Tage 1902,

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Datum in Mittl. Zeit	t	log. A	log. B	log. C	log. D	D
Aug. 10.229	0.6062	9.9001	0.9059	1.1384	1.1442_n	
11.226	0.6089	9.9012	0.9073	1.1450	1.1363_n	
12.223	0.6116	9.9027	0.9086	1.1515	1.1280_n	
13.221	0.6143	9.9046	0.9092	1.1577	1.1195_n	
14.218	0.6171	9.9066	0.9090	1.1637	1.1108_n	
15.215	0.6198	9.9086	0.9078	1.1695	1.1017_n	
16.213	0.6225	9.9104	0.9058	1.1751	1.0923_n	
17.210	0.6253	9.9118	0.9031	1.1805	1.0825_n	
18.207	0.6280	9.9129	0.9002	1.1857	1.0724_n	
19.204	0.6307	9.9135	0.8975	1.1908	1.0619_n	
20.202	0.6335	9.9138	0.8955	1.1956	1.0510_n	
21.199	0.6362	9.9139	0.8944	1.2003	1.0398_n	
22.196	0.6389	9.9141	0.8943	1.2049	1.0280_n	
23.193	0.6417	9.9146	0.8951	1.2092	1.0159_n	
24.191	0.6444	9.9154	0.8965	1.2134	1.0032_n	
25.188	0.6471	9.9166	0.8981	1.2175	0.9901_n	
26.185	0.6498	9.9183	0.8994	1.2214	0.9764_n	
27.183	0.6526	9.9203	0.9000	1.2251	0.9621_n	
28.180	0.6553	9.9224	0.8997	1.2287	0.9472_n	
29.177	0.6580	9.9244	0.8984	1.2321	0.9316_n	
30.174	0.6608	9.9261	0.8962	1.2354	0.9154_n	
31.172	0.6635	9.9275	0.8936	1.2385	0.8983_n	
Sept. 1.169	0.6662	9.9283	0.8909	1.2415	0.8804_n	
2.166	0.6690	9.9288	0.8886	1.2444	0.8616_n	
3.163	0.6717	9.9289	0.8871	1.2471	0.8419_n	
4.161	0.6744	9.9288	0.8865	1.2497	0.8210_n	−6.622
5.158	0.6771	9.9288	0.8871	1.2521	0.7989_n	6.294
6.155	0.6799	9.9290	0.8885	1.2544	0.7756_n	5.964
7.152	0.6826	9.9295	0.8903	1.2566	0.7507_n	5.633
8.150	0.6853	9.9305	0.8922	1.2586	0.7242_n	5.299
9.147	0.6881	9.9318	0.8937	1.2605	0.6958_n	−4.964
10.144	0.6908	9.9333	0.8943	1.2623	0.6653_n	4.627
11.142	0.6935	9.9349	0.8941	1.2639	0.6323_n	4.289
12.139	0.6963	9.9364	0.8928	1.2654	0.5965_n	3.949
13.136	0.6990	9.9377	0.8909	1.2668	0.5573_n	3.608
14.133	0.7017	9.9385	0.8885	1.2681	0.5141_n	−3.266
15.131	0.7045	9.9390	0.8863	1.2692	0.4658_n	2.923
16.128	0.7072	9.9391	0.8846	1.2702	0.4114_n	2.579

$E = +0.02$

Constanten für die Stern-Tage 1902,

gültig für die Sternzeit-Epochen $14^h\ 42^m.5$ Berlin.

Datum in Mittl. Zeit	t′	log. A	log. B	log. C	log. D	D
Sept. 16.128	0.7072	9.9391	0.8846	1.2702	0.4114$_n$	−2.579
17.125	0.7099	9.9390	0.8838	1.2711	0.3489$_n$	2.233
18.122	0.7126	9.9389	0.8840	1.2718	0.2758$_n$	1.887
19.120	0.7154	9.9390	0.8853	1.2724	0.1876$_n$	1.540
20.117	0.7181	9.9394	0.8873	1.2729	0.0765$_n$	1.193
21.114	0.7208	9.9402	0.8897	1.2733	9.9267$_n$	−0.845
22.112	0.7236	9.9414	0.8919	1.2735	9.6958$_n$	0.496
23.109	0.7263	9.9430	0.8936	1.2737	9.1688$_n$	−0.147
24.106	0.7290	9.9448	0.8945	1.2737	9.3043	+0.202
25.103	0.7318	9.9466	0.8944	1.2735	9.7409	0.551
26.101	0.7345	9.9483	0.8934	1.2733	9.9542	+0.900
27.098	0.7372	9.9496	0.8917	1.2729	0.0966	1.249
28.095	0.7400	9.9505	0.8899	1.2723	0.2036	1.598
29.092	0.7427	9.9510	0.8882	1.2717	0.2893	1.947
30.090	0.7454	9.9511	0.8873	1.2709	0.3608	2.295
Oct. 1.087	0.7481	9.9510	0.8872	1.2700	0.4221	+2.643
2.084	0.7509	9.9509	0.8883	1.2690	0.4757	2.990
3.081	0.7536	9.9509	0.8903	1.2678	0.5233	3.337
4.079	0.7563	9.9513	0.8929	1.2665	0.5662	3.683
5.076	0.7591	9.9520	0.8957	1.2651	0.6051	4.028
6.073	0.7618	9.9531	0.8983	1.2635	0.6407	+4.372
7.071	0.7645	9.9545	0.9002	1.2618	0.6734	4.715
8.068	0.7673	9.9560	0.9013	1.2600	0.7038	5.056
9.065	0.7700	9.9575	0.9013	1.2580	0.7321	5.397
10.062	0.7727	9.9588	0.9006	1.2559	0.7586	5.736
11.060	0.7754	9.9599	0.8993	1.2537	0.7834	+6.073
12.057	0.7782	9.9605	0.8979	1.2513	0.8068	6.409
13.054	0.7809	9.9608	0.8969	1.2487	0.8289	
14.051	0.7836	9.9609	0.8966	1.2460	0.8498	
15.049	0.7864	9.9608	0.8974	1.2432	0.8696	
16.046	0.7891	9.9609	0.8991	1.2402	0.8884	
17.043	0.7918	9.9613	0.9017	1.2371	0.9064	
18.041	0.7946	9.9620	0.9048	1.2338	0.9235	
19.038	0.7973	9.9632	0.9079	1.2303	0.9398	
20.035	0.8000	9.9647	0.9106	1.2267	0.9555	
21.032	0.8028	9.9665	0.9126	1.2230	0.9705	
22.030	0.8055	9.9685	0.9137	1.2190	0.9848	
23.027	0.8082	9.9703	0.9138	1.2149	0.9986	

$E = +0.''02$

Constanten für die Stern-Tage 1902,

gültig für die Sternzeit-Epochen $14^h\ 42^m.5$ Berlin.

Datum in Mittl. Zeit	t	log. A	log. B	log. C	log. D
Oct. 23.027	0.8082	9.9703	0.9138	1.2149	0.9986
24.024	0.8109	9.9719	0.9132	1.2106	1.0118
25.021	0.8137	9.9731	0.9122	1.2062	1.0246
26.019	0.8164	9.9739	0.9113	1.2015	1.0368
27.016	0.8191	9.9744	0.9108	1.1967	1.0486
28.013	0.8219	9.9746	0.9111	1.1917	1.0600
29.011	0.8246	9.9748	0.9123	1.1864	1.0709
30.008	0.8273	9.9750	0.9145	1.1810	1.0815
31.005	0.8301	9.9755	0.9175	1.1754	1.0916
Nov. 1.002	0.8328	9.9763	0.9207	1.1696	1.1015
2.000	0.8355	9.9775	0.9239	1.1636	1.1109
2.997	0.8382	9.9790	0.9265	1.1573	1.1201
3.994	0.8410	9.9807	0.9284	1.1508	1.1289
4.991	0.8437	9.9825	0.9293	1.1441	1.1375
5.989	0.8464	9.9841	0.9293	1.1371	1.1457
6.986	0.8492	9.9855	0.9287	1.1299	1.1537
7.983	0.8519	9.9866	0.9278	1.1224	1.1614
8.980	0.8546	9.9873	0.9271	1.1146	1.1688
9.978	0.8574	9.9877	0.9269	1.1066	1.1760
10.975	0.8601	9.9881	0.9275	1.0982	1.1830
11.972	0.8628	9.9884	0.9291	1.0896	1.1897
12.970	0.8656	9.9890	0.9315	1.0807	1.1961
13.967	0.8683	9.9899	0.9345	1.0714	1.2024
14.964	0.8710	9.9911	0.9376	1.0618	1.2084
15.961	0.8737	9.9928	0.9405	1.0518	1.2142
16.959	0.8765	9.9948	0.9429	1.0414	1.2198
17.956	0.8792	9.9969	0.9443	1.0307	1.2253
18.953	0.8819	9.9990	0.9449	1.0195	1.2305
19.950	0.8847	0.0010	0.9446	1.0079	1.2355
20.948	0.8874	0.0026	0.9438	0.9959	1.2403
21.945	0.8901	0.0039	0.9429	0.9833	1.2450
22.942	0.8929	0.0048	0.9422	0.9702	1.2494
23.940	0.8956	0.0055	0.9421	0.9566	1.2537
24.937	0.8983	0.0060	0.9428	0.9424	1.2578
25.934	0.9010	0.0065	0.9444	0.9276	1.2618
26.931	0.9038	0.0072	0.9467	0.9121	1.2656
27.929	0.9065	0.0082	0.9495	0.8959	1.2692
28.926	0.9092	0.0095	0.9523	0.8789	1.2726

$E = +0.02$

Constanten für die Stern-Tage 1902,

gültig für die Sternzeit-Epochen $14^h\ 42^m.5$ Berlin.

Datum in Mittl. Zeit	t	log. A	log. B	log. C	log. D	C
Nov. 28.926	0.9092	0.0095	0.9523	0.8789	1.2726	
29.923	0.9120	0.0111	0.9548	0.8611	1.2759	
30.920	0.9147	0.0130	0.9565	0.8423	1.2791	
Dec. 1.918	0.9174	0.0150	0.9575	0.8226	1.2820	
2.915	0.9202	0.0169	0.9575	0.8018	1.2849	+6.335
3.912	0.9229	0.0186	0.9568	0.7798	1.2876	+6.022
4.909	0.9256	0.0200	0.9556	0.7564	1.2901	5.707
5.907	0.9284	0.0211	0.9544	0.7316	1.2924	5.390
6.904	0.9311	0.0219	0.9535	0.7051	1.2947	5.071
7.901	0.9338	0.0225	0.9533	0.6767	1.2968	4.750
8.899	0.9365	0.0231	0.9540	0.6462	1.2987	+4.428
9.896	0.9393	0.0238	0.9554	0.6133	1.3005	4.105
10.893	0.9420	0.0248	0.9575	0.5775	1.3021	3.780
11.890	0.9447	0.0260	0.9599	0.5383	1.3036	3.454
12.888	0.9475	0.0277	0.9622	0.4951	1.3050	3.127
13.885	0.9502	0.0297	0.9641	0.4469	1.3062	+2.798
14.882	0.9529	0.0318	0.9652	0.3925	1.3073	2.469
15.879	0.9557	0.0340	0.9654	0.3302	1.3083	2.139
16.877	0.9584	0.0361	0.9648	0.2572	1.3091	1.808
17.874	0.9611	0.0380	0.9635	0.1692	1.3098	1.477
18.871	0.9638	0.0395	0.9619	0.0586	1.3103	+1.145
19.869	0.9666	0.0407	0.9604	9.9096	1.3107	0.812
20.866	0.9693	0.0415	0.9593	9.6808	1.3110	0.480
21.863	0.9720	0.0422	0.9589	9.1661	1.3111	+0.147
22.860	0.9748	0.0428	0.9593	9.2704_n	1.3111	—0.186
23.858	0.9775	0.0435	0.9605	9.7154_n	1.3109	—0.519
24.855	0.9802	0.0444	0.9623	9.9305_n	1.3107	0.852
25.852	0.9830	0.0457	0.9642	0.0736_n	1.3103	1.185
26.849	0.9857	0.0472	0.9660	0.1810_n	1.3097	1.517
27.847	0.9884	0.0489	0.9671	0.2669_n	1.3090	1.849
28.844	0.9911	0.0508	0.9676	0.3385_n	1.3082	—2.180
29.841	0.9939	0.0527	0.9671	0.3998_n	1.3072	2.510
30.838	0.9966	0.0544	0.9658	0.4534_n	1.3061	2.840
31.836	0.9993	0.0559	0.9639	0.5009_n	1.3048	3.169
32.833	1.0021	0.0570	0.9618	0.5437_n	1.3035	3.497
33.830	1.0048	0.0579	0.9599	0.5825_n	1.3019	—3.824
34.828	1.0075	0.0585	0.9586	0.6180_n	1.3003	4.149
35.825	1.0103	0.0591	0.9580	0.6507_n	1.2984	4.474

$E = +0\overset{''}{.}02$

Constanten für die mittleren Tage 1902,

zur Reduction von dem Mittl. Aequin. 1900.0 auf das jedesmalige wahre Aequinoctium.

12h Mittl. Zeit	f	log. g	G	12h Mittl. Zeit	f	log. g	G
1901 Dec. 29	+102.66″	1.65586	9° 35.8′	April 24	+114.68″	1.70260	8° 27.0′
1902 Jan. 2	103.28	1.65843	9 32.1	28	115.08	1.70420	8 31.3
6	103.90	1.66092	9 27.8	Mai 2	115.50	1.70587	8 35.7
10	104.50	1.66333	9 22.9	6	115.94	1.70762	8 40.0
14	105.09	1.66566	9 17.4	10	116.40	1.70943	8 44.2
18	+105.66	1.66790	9 11.5	14	+116.89	1.71131	8 48.1
22	106.21	1.67003	9 5.3	18	117.39	1.71325	8 51.7
26	106.74	1.67206	8 59.0	22	117.91	1.71524	8 54.9
30	107.25	1.67399	8 52.6	26	118.45	1.71728	8 57.6
Febr. 3	107.73	1.67582	8 46.2	30	119.01	1.71935	8 59.9
7	+108.19	1.67755	8 40.0	Juni 3	+119.58	1.72145	9 1.6
11	108.63	1.67918	8 34.0	7	120.16	1.72357	9 2.7
15	109.04	1.68072	8 28.3	11	120.75	1.72570	9 3.2
19	109.43	1.68217	8 23.1	15	121.34	1.72784	9 3.0
23	109.80	1.68355	8 18.4	19	121.94	1.72996	9 2.2
27	+110.15	1.68486	8 14.3	23	+122.54	1.73206	9 0.8
März 3	110.49	1.68612	8 10.9	27	123.14	1.73414	8 58.8
7	110.81	1.68734	8 8.2	Juli 1	123.73	1.73618	8 56.3
11	111.12	1.68852	8 6.1	5	124.32	1.73818	8 53.2
15	111.42	1.68968	8 4.8	9	124.90	1.74013	8 49.7
19	+111.72	1.69084	8 4.3	13	+125.47	1.74203	8 45.7
23	112.02	1.69200	8 4.5	17	126.02	1.74387	8 41.3
27	112.32	1.69317	8 5.4	21	126.56	1.74564	8 36.6
31	112.62	1.69437	8 7.0	25	127.08	1.74733	8 31.8
April 4	112.93	1.69561	8 9.2	29	127.58	1.74895	8 26.8
8	+113.25	1.69689	8 12.0	Aug. 2	+128.07	1.75049	8 21.6
12	113.58	1.69822	8 15.2	6	128.54	1.75196	8 16.4
16	113.93	1.69961	8 18.8	10	128.98	1.75337	8 11.4
20	114.29	1.70107	8 22.8	14	129.40	1.75470	8 6.5
24	114.68	1.70260	8 27.0	18	129.80	1.75597	8 1.8

Constanten für die mittleren Tage 1902,

zur Reduction von dem Mittl. Aequin. 1900.0 auf das jedesmalige wahre Aequinoctium.

12h Mittl. Zeit	f	log. g	G	12h Mittl. Zeit	f	log. g	G
Aug. 18	+129.80″	1.75597	8° 1.8′	Oct. 29	+135.71″	1.77526	7° 58.4′
22	130.18	1.75717	7 57.4	Nov. 2	136.12	1.77665	8 2.1
26	130.55	1.75832	7 53.3	6	136.56	1.77811	8 5.8
30	130.90	1.75942	7 49.6	10	137.02	1.77963	8 9.4
Sept. 3	131.23	1.76046	7 46.5	14	137.50	1.78122	8 12.8
7	+131.55	1.76147	7 43.9	18	+138.00	1.78287	8 16.0
11	131.86	1.76245	7 41.7	22	138.53	1.78457	8 18.8
15	132.16	1.76341	7 40.1	26	139.08	1.78633	8 21.3
19	132.45	1.76435	7 39.2	30	139.65	1.78814	8 23.3
23	132.74	1.76530	7 38.9	Dec. 4	140.24	1.78998	8 24.8
27	+133.03	1.76626	7 39.1	8	+140.84	1.79185	8 25.7
Oct. 1	133.33	1.76724	7 39.9	12	141.45	1.79373	8 26.0
5	133.63	1.76824	7 41.3	16	142.06	1.79562	8 25.7
9	133.94	1.76928	7 43.2	20	142.68	1.79750	8 24.8
13	134.26	1.77036	7 45.6	24	143.31	1.79937	8 23.3
17	+134.60	1.77149	7 48.4	28	+143.93	1.80122	8 21.2
21	134.95	1.77268	7 51.5	32	144.55	1.80303	8 18.6
25	135.32	1.77394	7 54.8	36	145.16	1.80480	8 15.4
29	135.71	1.77526	7 58.4	40	145.76	1.80652	8 11.8

$$\text{Red. in } \alpha = f + g \sin (G + \alpha) \operatorname{tg} \delta$$
$$\text{Red. in } \delta = g \cos (G + \alpha)$$

Im Jahre 1902 werden drei Sonnen-Finsternisse und zwei Mond-Finsternisse stattfinden, von denen in unseren Gegenden die dritte Sonnen-Finsternifs und die beiden Mond-Finsternisse sichtbar sein werden.

I. Partielle Sonnen-Finsternifs 1902 April 8,

unsichtbar in Berlin.

Elemente der Finsternifs

nach wahrer Berliner Zeit τ.

	0ʰ 17ᵐ 1ˢ.1	1ʰ 29ᵐ 2ˢ.0	2ʰ 41ᵐ 2ˢ.8	3ʰ 53ᵐ 3ˢ.7	5ʰ 5ᵐ 4ˢ.5
τ	4°.2547	22°.2582	40°.2617	58°.2653	76°.2688
λ☾	16° 20′ 5″.5	17° 3′ 44″.4	17° 47′ 25″.3	18° 31′ 8″.3	19° 14′ 53″.2
β☾	+ 1 38 3.6	+ 1 34 13.6	+ 1 30 22.5	+ 1 26 30.3	+ 1 22 37.1
π☾	0 59 58.02	0 59 59.56	1 0 1.04	1 0 2.49	1 0 3.93
Δα′⊙	− 0 0 16.67	− 0 0 10.89	− 0 0 5.11	+ 0 0 0.68	+ 0 0 6.47
δ′⊙	+ 6 56 43.9	+ 6 57 49.7	+ 6 58 55.4	+ 7 0 1.2	+ 7 1 6.9
N'	72 59 31.1	73 0 22.0	73 1 15.0	73 2 10.1	73 3 7.3
γ	+1.502140	+1.502117	+1.502093	+1.502067	+1.502040
u'_a	+0.539947	+0.539893	+0.539806	+0.539684	+0.539524
u'_i	+0.006428	+0.006481	+0.006568	+0.006690	+0.006849
log sin f_a	7.669114	7.669108	7.669101	7.669095	7.669088
log sin f_i	7.666944_n	7.666937_n	7.666931_n	7.666924_n	7.666917_n
log n	9.755429	9.755477	9.755508	9.755521	9.755513
μ	44°.1525	44°.1582	44°.1644	44°.1711	44°.1784
k	73° 7′ 13″.9	73° 8′ 6″.8	73° 9′ 1″.8	73° 9′ 58″.9	73° 10′ 58″.1
g	18 19 57.6	18 19 34.9	18 19 10.3	18 18 43.8	18 18 15.5
K	87 52 53.9	87 52 40.7	87 52 27.8	87 52 15.2	87 52 3.0
G	21 34 13.7	21 38 20.5	21 42 30.2	21 46 42.6	21 50 57.8

	Mittl. Zeit Berlin	O. L. Gr.	Breite
Beginn der Finsternifs	2ʰ 24ᵐ.3	234° 0′	+59° 53′
Ende der Finsternifs	3 32.8	172 30	+80 51

Gröfse der Verfinsterung in Theilen des Sonnendurchmessers = 0.071

Da die Finsternifs nur in nördlichen Polargegenden sichtbar sein wird, erscheinen nähere Angaben über die Grenzen der Sichtbarkeit nicht geboten.

II. Totale Mond-Finsternifs 1902 April 22,

theilweise sichtbar in Berlin.

Elemente der Finsternifs

nach mittlerer Berliner Zeit.

☍ in AR	April 22	$7^h\ 54^m\ 29^s.9$
☾ AR.		13 58 9.47
☾ Decl.		$-12°\ 19'\ 26''.0$
⊙ »		+12 4 17.2
☾ stündliche Bewegung in AR.		30 3.1
⊙ » » » »		2 20.2
☾ » » » Decl.		−7 51.0
⊙ » » » »		+ 50.6
☾ Aequatorial-Horizontal-Parallaxe		54 40.3
⊙ » » »		8.7
☾ Halbmesser		14 53.9
⊙ »		15 54.3

Anfang der Finsternifs überhaupt	April 22	$5^h\ 53^m.9$	mittl. Berl. Zt.
Anfang der totalen Verfinsterung		7 3.8	» » »
Mitte der Finsternifs		7 46.4	» » »
Ende der totalen Verfinsterung		8 29.0	» » »
Ende der Finsternifs überhaupt		9 38.9	» » »

Der Mond steht um diese Zeiten im Zenith der Orte, deren geographische Lage bezüglich ist:

$103°\ 39'$	östl. Länge von Greenwich	$12°\ 4'$	südl. Br.
86 43	» » » »	12 13	» »
76 23	» » » »	12 18	» »
66 3	» » » »	12 24	» »
49 7	» » » »	12 33	» »

Positionswinkel des Eintritts vom Nordpunkt gezählt = 89°
» » Austritts » » » = 300

Gröfse der Verfinsterung in Theilen des Monddurchmessers = 1.337

Die Finsternifs wird demnach in der westlichen Hälfte des grofsen Oceans, in Australien, Asien, Europa, Afrika, in der östlichen Hälfte des atlantischen Oceans und an der Ostspitze Südamerikas zu sehen sein. — In Berlin geht der Mond erst um $7^h\ 5^m$, also bereits total verfinstert, auf.

III. Partielle Sonnen-Finsternifs 1902 Mai 7,

unsichtbar in Berlin.

Elemente der Finsternifs

nach wahrer Berliner Zeit τ.

	8h 53m 13s.9	10h 5m 14s.1	11h 17m 14s.3	12h 29m 14s.5	13h 41m 14s.7
τ	133°.3078	151°.3087	169°.3095	187°.3104	205°.3112
λ☾	44° 39′ 2″.4	45° 24′ 8″.7	46° 9′ 16″.3	46° 54′ 25″.3	47° 39′ 35″.6
β☾	— 0 56 42.3	— 1 0 48.1	— 1 4 53.4	— 1 8 58.1	— 1 13 2.2
π☾	1 1 0.40	1 1 1.30	1 1 2.15	1 1 2.96	1 1 3.73
Δα′☉	— 0 0 11.79	— 0 0 5.58	+ 0 0 0.64	+ 0 0 6.86	+ 0 0 13.08
δ′☉	+16 43 27.73	+16 44 16.52	+16 45 5.27	+16 45 53.98	+16 46 42.66
N′	78 50 6.7	78 50 29.5	78 50 51.9	78 51 13.6	78 51 34.1
γ	—1.083860	—1.083843	—1.083825	—1.083807	—1.083788
u'_a	+0.533372	+0.533372	+0.533336	+0.533263	+0.533153
u'_i	+0.012970	+0.012970	+0.013006	+0.013079	+0.013188
log sin f_a	7.665708	7.665703	7.665698	7.665692	7.665687
log sin f_i	7.663537_n	7.663532_n	7.663527_n	7.663522_n	7.663516_n
log *n*	9.763851	9.763891	9.763912	9.763914	9.763898
μ	172°.8599	172°.8630	172°.8664	172°.8700	172°.8739
k	79° 18′ 47″.3	79° 19′ 11″.9	79° 19′ 36″.1	79° 19′ 59″.6	79° 20′ 22″.0
g	20 1 10.9	20 1 38.8	20 2 6.9	20 2 35.4	20 3 4.5
K	86 44 57.6	86 44 55.2	86 44 52.7	86 44 50.0	86 44 47.0
G	55 33 19.8	55 35 31.7	55 37 42.2	55 39 50.7	55 41 56.4

	Mittl. Zeit Berlin	O. L. Gr.	Breite
Beginn der Finsternifs	9h 36m.2	160° 40′	—53° 12′
Ende der Finsternifs	13 19.9	252 28	—32 37

Gröfse der Verfinsterung in Theilen des Sonnendurchmessers = 0.864

Grenzcurven für die Sichtbarkeit der Finsterniſs.

Westl. Grenze		Nördl. Grenze		Oestl. Grenze	
O.L.Gr.	Br.	O.L.Gr.	Br.	O.L.Gr.	Br.
222° 14′	−70° 28′	145° 42′	−42° 53′	263° 25′	−21° 49′
195 50	73 46	154 54	39 50	267 47	24 10
180 52	73 24	166 11	35 22	270 20	28 34
163 51	70 54	176 16	30 41	271 59	34 10
151 57	66 26	185 17	26 3	272 43	40 23
145 13	60 55	193 33	21 46	272 30	46 46
142 6	55 9	201 27	18 9	271 9	52 52
141 28	49 44	209 22	15 29	268 40	58 8
142 43	45 23	217 38	13 59	266 1	61 33
145 42	−42 53	226 28	13 45	249 25	70 28
		236 7	14 46	219 1	−73 54
		246 47	16 57		
		263 25	−21 49		

Die südliche Grenzcurve ist imaginär.

Die Finsterniſs wird daher auf Neu-Seeland und im südlichen Theil des groſsen Oceans sichtbar sein.

IV. Totale Mond-Finsterniſs 1902 Oct. 16

theilweise sichtbar in Berlin.

Elemente der Finsterniſs

nach mittlerer Berliner Zeit.

☍ in AR.	Oct. 16	19ʰ 3ᵐ 48ˢ.0
☾ AR.		1 24 52.59
☾ Decl.		+9° 8′ 52″.8
⊙ »		−8 55 20.6
☾ stündliche Bewegung in AR. .		34 34.7
⊙ » » » » .		2 20.0
☾ » » » Decl. .		+10 6.4
⊙ » » » » .		− 55.2
☾ Aequatorial-Horizontal-Parallaxe		59 13.2
⊙ » » »		8.8
☾ Halbmesser		16 8.3
⊙ »		16 3.2

Anfang der Finsterniſs überhaupt . Oct. 16	17ʰ 10ᵐ.6	mittl. Berl. Zt.
Anfang der totalen Verfinsterung	18 12.2	» » »
Mitte der Finsterniſs	18 57.0	» » »
Ende der totalen Verfinsterung	19 41.8	» » »
Ende der Finsterniſs überhaupt	20 43.4	» » »

Der Mond steht um diese Zeiten im Zenith der Orte, deren geographische Lage bezüglich ist:

291° 9′	östl. Länge von Greenwich	8° 50′ nördl. Br.
276 17	» » » »	9 0 » »
265 29	» » » »	9 8 » »
254 42	» » » »	9 15 » »
239 50	» » » »	9 26 » »

Positionswinkel des Eintritts vom Nordpunkt gezählt = 86°
» » Austritts » » » = 241

Gröſse der Verfinsterung in Theilen des Monddurchmessers = 1.463

Die Finsterniſs wird demnach im westlichen Europa und Afrika, im atlantischen Ocean, in Amerika, im groſsen Ocean, an der Ostspitze Australiens und dem äuſsersten Nordosten Asiens sichtbar sein. — In Berlin geht der Mond bereits um 18ʰ 31ᵐ, also noch vor der Mitte der Finsterniſs, unter.

V. Partielle Sonnen-Finsternifs 1902 Oct. 30,
sichtbar in Berlin.

Elemente der Finsternifs
nach wahrer Berliner Zeit τ.

	19ʰ 21ᵐ 14ˢ.9	20ʰ 33ᵐ 15ˢ.1	21ʰ 45ᵐ 15ˢ.2	22ʰ 57ᵐ 15ˢ.3	24ʰ 9ᵐ 15ˢ.5
τ	290°.3122	308°.3128	326°.3134	344°.3140	362°.3145
λ☾	215° 55′ 27″.7	216° 32′ 39″.4	217° 9′ 49″.4	217° 46′ 57″.7	218° 24′ 4″.3
β☾	+ 0 58 19.5	+ 1 1 41.7	+ 1 5 3.4	+ 1 8 24.4	+ 1 11 44.8
π☾	0 55 19.71	0 55 18.39	0 55 17.09	0 55 15.80	0 55 14.51
Δα′⊙	— 0 0 5.94	— 0 0 0.42	+ 0 0 5.10	+ 0 0 10.63	+ 0 0 16.15
δ′⊙	—13 49 26.0	—13 50 23.7	—13 51 21.4	—13 52 19.1	—13 53 16.7
N'	103 27 56.6	103 27 38.8	103 27 21.1	103 27 3.6	103 26 46.6
γ	+1.155534	+1.155568	+1.155601	+1.155635	+1.155670
u'_a	+0.565189	+0.565340	+0.565459	+0.565548	+0.565608
u'_i	—0.018688	—0.018838	—0.018957	—0.019046	—0.019105
log sin f_a	7.673152	7.673158	7.673164	7.673170	7.673176
log sin f_i	7.670981_n	7.670987_n	7.670993_n	7.670999_n	7.671006_n
log n	9.714884	9.714880	9.714858	9.714822	9.714773
μ	317°.5375	317°.5411	317°.5444	317°.5474	317°.5503
k	103° 4′ 7″.2	103° 3′ 46″.6	103° 3′ 26″.2	103° 3′ 6″.0	103° 2′ 46″.1
g	19 12 22.6	19 12 51.1	19 13 19.7	19 13 48.5	19 14 17.7
K	86 43 31.1	86 43 22.9	86 43 14.1	86 43 5.1	86 42 56.1
G	224 56 21.0	224 58 57.5	225 1 33.7	225 4 9.1	225 6 43.4

	Mittl. Zeit Berlin	O.L. Gr.	Breite
Beginn der Finsternifs	18ʰ 52ᵐ.2	18° 27′	+58° 41′
Ende der Finsternifs	22 55.8	107 1	+33 22

Gröfse der Verfinsterung in Theilen des Sonnendurchmessers = 0.701

Grenzcurven für die Sichtbarkeit der Finsternifs.

Westl. Grenze		Südl. Grenze		Oestl. Grenze	
O. L. Gr.	Br.	O. L. Gr.	Br.	O. L. Gr.	Br.
49° 4'	+76° 43'	2° 28'	+48° 22'	119° 7'	+22° 32'
23 14	75 5	11 47	45 47	120 35	23 3
8 44	71 20	22 58	41 56	123 37	25 13
1 24	66 53	32 55	37 41	126 15	28 30
357 58	62 19	41 41	33 14	128 27	32 37
356 50	57 58	49 34	28 49	130 13	37 21
357 13	54 6	56 57	24 43	131 30	42 32
358 42	50 57	64 21	21 14	132 10	48 5
1 7	48 52	72 9	18 43	131 59	54 2
2 28	+48 22	80 38	17 25	130 4	60 41
		90 0	17 25	117 49	71 14
		100 29	18 37	80 1	+76 50
		119 7	+22 32		

Die nördliche Grenzcurve ist imaginär.

Die Finsternifs erstreckt sich daher über das mittlere, nördliche und östliche Europa und über das Innere Asiens mit Einschlufs der nördlichen und südöstlichen Küstengebiete dieses Erdtheils.

In der folgenden Uebersicht über die näheren Umstände der Finsternifs im mittleren Europa ist als Einheit von $\Delta\lambda$ die Zeitminute und die östliche Richtung positiv zu nehmen. Diejenigen Zeiten des Eintrittes, welche vor Sonnen-Aufgang liegen und welche zur genäherten Bestimmung der Zeit der gröfsten Phase dienen können, sind durch ein * bezeichnet. Für Orte, welche der Grenze der Finsternifs sehr nahe liegen, wird die nachstehende Tafel naturgemäfs nur verhältnifsmäfsig unsichere Werthe ergeben.



Grenzcurven der partiellen Sonnenfinsternifs 1902 October 30.

Polhöhe	Mittlere Ortszeit des Eintrittes			Positions-Winkel	Mittlere Ortszeit des Austrittes			Positions-Winkel	Größte Phase
Länge von Berlin: −30m									
+48°	18h 47m.3	69	+0m.46 Δλ	10°.4	19h 10m.2	91	+1m.81 Δλ	28°.9	0.02
49	40.4*	43	+0.69 »	3.7	19.3	65	+1.57 »	35.3	0.04
50	36.1*	31	+0.77 »	359.0	25.8	53	+1.47 »	39.8	0.06
51	33.0*	23	+0.82 »	355.2	31.1	47	+1.42 »	43.4	0.08
52	30.7*	19	+0.85 »	351.9	35.8	42	+1.38 »	46.4	0.10
53	28.8*	15	+0.87 »	349.0	40.0	38	+1.36 »	49.0	0.13
54	27.3*	12	+0.89 »	346.4	43.8	35	+1.34 »	51.4	0.15
55	26.1*	9	+0.90 »	344.0	47.3	34	+1.32 »	53.6	0.17
56	25.2*	7	+0.91 »	341.7	50.7	32	+1.30 »	55.6	0.19
57	24.5*	5	+0.92 »	339.6	53.9	30	+1.29 »	57.5	0.21
58	24.0*		+0.93 »	337.6	56.9		+1.28 »	59.3	0.23
Länge von Berlin: −15m									
+48°	18h 55m.8	44	+0m.65 Δλ	4°.0	19h 36m.0	65	+1m.66 Δλ	36°.0	0.04
49	51.4	32	+0.76 »	359.4	42.5	54	+1.54 »	40.4	0.07
50	48.2	25	+0.82 »	355.6	47.9	46	+1.47 »	43.9	0.09
51	45.7*	20	+0.86 »	352.3	52.5	41	+1.43 »	46.9	0.11
52	43.7*	16	+0.88 »	349.4	19 56.6	38	+1.40 »	49.5	0.13
53	42.1*	13	+0.90 »	346.8	20 0.4	36	+1.38 »	51.9	0.15
54	40.8*	10	+0.91 »	344.3	4.0	33	+1.36 »	54.1	0.17
55	39.8*	7	+0.92 »	342.1	7.3	31	+1.34 »	56.1	0.19
56	39.1*	6	+0.93 »	340.0	10.4	29	+1.32 »	57.9	0.21
57	38.5*	4	+0.94 »	338.0	13.3	28	+1.31 »	59.6	0.23
58	38.1*		+0.95 »	336.0	16.1		+1.30 »	61.3	0.25
Länge von Berlin: 0m									
+48°	19h 6m.6	33	+0m.77 Δλ	359°.4	20h 0m.3	52	+1m.60 Δλ	41°.4	0.06
49	3.3	26	+0.82 »	355.7	5.5	45	+1.53 »	44.8	0.09
50	19 0.7	20	+0.86 »	352.5	10.0	41	+1.48 »	47.7	0.11
51	18 58.7	16	+0.89 »	349.6	14.1	37	+1.45 »	50.3	0.13
52	57.1	13	+0.91 »	347.0	17.8	35	+1.42 »	52.6	0.15
53	55.8	11	+0.92 »	344.6	21.3	32	+1.40 »	54.7	0.17
54	54.7*	9	+0.94 »	342.3	24.5	30	+1.38 »	56.7	0.19
55	53.8*	6	+0.95 »	340.2	27.5	29	+1.36 »	58.5	0.21
56	53.2*	4	+0.96 »	338.2	30.4	27	+1.34 »	60.1	0.23
57	52.8*	3	+0.96 »	336.3	33.1	26	+1.33 »	61.7	0.25
58	52.5*		+0.97 »	334.5	35.7		+1.32 »	63.2	0.27

Polhöhe	Mittlere Ortszeit des Eintrittes			Positions-Winkel	Mittlere Ortszeit des Austrittes			Positions-Winkel	Gröſste Phase
	Länge von Berlin: +15^m								
+48°	19^h 18.6^m	26	+0.83^m Δλ	355.5°	20^h 24.1^m	44	+1.59^m Δλ	45.9°	0.09
49	16.0	20	+0.87 »	352.4	28.5	40	+1.54 »	48.7	0.11
50	14.0	16	+0.90 »	349.6	32.5	36	+1.51 »	51.2	0.13
51	12.4	14	+0.92 »	347.0	36.1	33	+1.48 »	53.5	0.15
52	11.0	12	+0.93 »	344.6	39.4	31	+1.45 »	55.6	0.17
53	9.8	9	+0.94 »	342.3	42.5	29	+1.42 »	57.5	0.19
54	8.9	7	+0.96 »	340.2	45.4	28	+1.40 »	59.3	0.21
55	8.2	5	+0.97 »	338.3	48.2	26	+1.38 »	60.9	0.23
56	7.7	3	+0.98 »	336.5	50.8	24	+1.37 »	62.4	0.25
57	7.4	2	+0.98 »	334.7	53.2	24	+1.35 »	63.8	0.27
58	7.2*		+0.99 »	332.9	55.6		+1.34 »	65.2	0.29
	Länge von Berlin: +30^m								
+48°	19^h 31.5^m	21	+0.89^m Δλ	352.0°	20^h 47.9^m	38	+1.60^m Δλ	50.0°	0.12
49	29.4	17	+0.91 »	349.3	51.7	35	+1.56 »	52.4	0.14
50	27.7	15	+0.93 »	346.8	55.2	32	+1.53 »	54.6	0.16
51	26.2	12	+0.94 »	344.5	20 58.4	29	+1.50 »	56.6	0.18
52	25.0	9	+0.95 »	342.3	21 1.3	28	+1.47 »	58.4	0.20
53	24.1	7	+0.96 »	340.2	4.1	26	+1.45 »	60.1	0.22
54	23.4	5	+0.97 »	338.2	6.7	24	+1.43 »	61.7	0.24
55	22.9	4	+0.98 »	336.4	9.1	23	+1.41 »	63.2	0.26
56	22.5	2	+0.99 »	334.7	11.4	22	+1.39 »	64.6	0.28
57	22.3	1	+1.00 »	333.0	13.6	22	+1.37 »	65.9	0.30
58	22.2		+1.01 »	331.3	15.8		+1.36 »	67.2	0.32
	Berlin								
—	18^h 56.4^m		—	345.8°	20^h 19.6^m		—	53.7°	0.16

Verzeichniſs von Fixsternen, welche im Jahre 1902 vom Monde bedeckt werden.

Nr.	Name	Gr.	Mittl. AR. 1902.0	Mittl. Decl. 1902.0
			h m s	° ′ ″
1	δ Piscium	4.3	0 43 35.78	+ 7 3 6.1
2	ε Piscium	4.0	0 57 51.33	+ 7 21 45.7
3	ζ¹ Piscium	4.8	1 8 36.53	+ 7 3 25.7
4	δ¹ Tauri	4.0	4 17 16.89	+17 18 46.3
5	δ³ Tauri	5.0	4 19 49.03	+17 42 14.0
6	ε Tauri	3.6	4 22 53.56	+18 57 47.7
7	*i* Tauri	5.4	4 45 38.34	+18 40 23.2
8	*m* Tauri	5.4	5 1 39.43	+18 30 49.2
9	*l* Tauri	5.5	5 2 0.39	+20 17 19.9
10	119 Tauri	5.3	5 26 27.97	+18 31 17.2
11	ζ Tauri	3.3	5 31 47.23	+21 4 58.5
12	χ¹ Orionis	4.6	5 48 34.71	+20 15 29.0
13	χ⁴ Orionis	5.0	5 58 5.94	+20 8 26.9
14	ν Geminorum . .	4.6	6 23 8.60	+20 16 27.9
15	26 Geminorum . .	5.5	6 36 41.93	+17 44 28.6
16	λ Geminorum . .	3.8	7 12 27.69	+16 43 2.8
17	68 Geminorum . .	5.5	7 28 0.95	+16 2 14.6
18	α Cancri	4.0	8 53 7.67	+12 14 14.2
19	κ Cancri	5.0	9 2 26.36	+11 3 45.8
20	ο Leonis	3.6	9 35 55.27	+10 20 18.1
21	π Leonis	5.0	9 55 2.10	+ 8 30 52.4
22	*d* Leonis	4.8	10 55 29.92	+ 4 8 37.2
23	*p*⁵ Leonis	5.3	11 8 44.58	+ 0 27 49.4
24	75 Leonis	5.5	11 12 14.79	+ 2 32 57.7
25	υ Leonis	4.8	11 31 55.82	− 0 16 57.6
26	χ Virginis	5.0	12 34 11.21	− 7 27 22.4
27	ψ Virginis	5.0	12 49 15.29	− 9 0 24.2
28	α Virginis	1	13 20 1.69	−10 38 59.8
29	*h* Virginis	5.0	13 27 48.22	− 9 39 36.6
30	λ Virginis	4.6	14 13 48.28	−12 55 12.7

Verzeichniſs von Fixsternen, welche im Jahre 1902 vom Monde bedeckt werden.

Nr.	Name	Gr.	Mittl. AR. 1902.0	Mittl. Decl. 1902.0
			h m s	° ′ ″
31	α Librae	2.3	14 45 27.28	—15 38 5.7
32	ϑ Librae	4.7	15 48 14.63	—16 26 31.4
33	β¹ Scorpii	2.0	15 59 44.18	—19 32 15.6
34	ν Scorpii	4.0	16 6 17.83	—19 12 22.3
35	ψ Ophiuchi	5.0	16 18 22.00	—19 48 29.9
36	24 Scorpii	5.0	16 35 54.19	—17 33 9.9
37	ξ Ophiuchi	5.0	17 15 7.75	—21 0 28.3
38	ρ¹ Sagittarii	4.0	19 15 59.33	—18 1 55.1
39	υ Sagittarii	4.6	19 16 6.89	—16 8 20.8
40	e² Sagittarii	5.0	19 36 54.77	—16 21 14.3
41	g Sagittarii	5.5	19 52 23.54	—15 45 6.1
42	β Capricorni . . .	3.0	20 15 30.33	—15 5 27.9
43	ν Aquarii	4.3	21 4 15.37	—11 46 7.5
44	ξ Aquarii	4.9	21 32 32.09	— 8 17 38.3
45	c¹ Capricorni . . .	4.8	21 39 46.72	— 9 31 57.5
46	30 Aquarii	5.4	21 58 7.15	— 6 59 46.2
47	κ Aquarii	5.2	22 32 40.84	— 4 44 1.1
48	κ Piscium	5.3	23 21 54.47	+ 0 43 8.2
49	λ Piscium	5.0	23 37 2.68	+ 1 14 26.4

Elemente der Stern-Bedeckungen 1902.

Nr.	Zeit der Conj. in AR.	q	p'	q'
	Jan.			
	d h m			
26	1 5 14.4	+0.9454	5237	−1786
27	1 13 1.9	+1.2684	5236	−1737
28	2 4 56.0	+0.4042	5243	−1617
29	2 8 56.4	−1.3266	5248	−1583
30	3 8 28.2	−1.1958	5292	−1349
31	4 0 25.0	−0.1940	5332	−1160
33	5 12 54.0	+0.8140	5439	−0641
34	5 16 3.5	+0.2516	5448	−0591
35	5 21 50.9	+0.6028	5464	−0498
37	7 0 43.0	+1.1904	5523	−0043
43	11 12 3.6	+0.2706	5480	+1606
44	12 1 35.2	−1.1640	5463	+1734
45	12 5 3.6	+0.7581	5459	+1762
46	12 13 52.2	−0.3456	5453	+1828
47	13 6 29.4	+0.3898	5450	+1920
48	14 6 3.9	−0.7052	5471	+1976
49	14 13 15.2	+0.1732	5485	+1975
1	15 20 15.4	+0.1721	5578	+1871
2	16 2 44.3	+1.0504	5607	+1827
6	19 16 35.6	+0.2914	6034	+0520
7	20 1 28.1	+0.9557	6058	+0322
8	20 7 41.2	+1.2710	6070	+0179
9	20 7 49.3	−0.5018	6070	+0176
11	20 19 20.7	−1.2451	6077	−0091
12	21 1 50.5	−0.5286	6074	−0241
13	21 5 31.8	−0.5160	6072	−0326
14	21 15 16.2	−1.0752	6055	−0546
15	21 20 34.4	+1.1410	6041	−0661
16	22 10 43.3	+1.0251	5987	−0954
17	22 16 57.9	+1.0772	5959	−1073
18	24 4 28.9	+0.0902	5751	−1612
19	24 8 31.9	+0.6280	5727	−1656
20	24 23 23.6	−1.1994	5634	−1792
21	25 8 5.5	−0.9074	5583	−1850
23	26 19 1.3	+0.8175	5410	−1942
25	27 6 24.7	−0.5982	5369	−1929
26	28 13 37.7	+1.2374	5298	−1800

Nr.	Zeit der Conj. in AR.	q	p'	q'
	Jan.			
	d h m			
28	29 12 54.4	+0.7113	5287	−1629
29	29 16 51.4	−1.0066	5288	−1594
30	30 16 8.2	−0.8841	5308	−1358
31	31 8 0.0	+0.1019	5334	−1168
	Febr.			
33	1 20 30.1	+1.0680	5418	−0651
34	1 23 40.4	+0.5022	5425	−0602
35	2 5 29.2	+0.8445	5440	−0510
38	5 16 51.0	+0.5157	5554	+0898
40	6 2 34.1	−0.3476	5553	+1052
48	10 11 58.6	−0.9052	5541	+1982
49	10 19 1.5	−0.0462	5553	+1981
1	12 1 33.4	−0.0904	5622	+1873
2	12 7 58.6	+0.7797	5644	+1828
5	15 21 27.5	+1.2538	5949	+0550
6	15 22 41.8	+0.0448	5951	+0524
7	16 7 49.3	+0.7292	5966	+0330
8	16 14 13.5	+1.0579	5974	+0191
9	16 14 21.9	−0.7372	5974	+0188
10	17 0 7.5	+1.1327	5979	−0026
12	17 8 57.3	−0.7348	5974	−0219
13	17 12 45.8	−0.7151	5970	−0301
14	17 22 49.0	−1.2626	5954	−0516
15	18 4 17.3	+0.9954	5943	−0629
16	18 18 52.1	+0.9090	5898	−0916
17	19 1 17.5	+0.9762	5875	−1034
18	20 13 36.5	+0.0680	5710	−1573
19	20 17 43.2	+0.6210	5688	−1619
20	21 8 45.5	−1.1780	5618	−1760
21	21 17 31.1	−0.8590	5578	−1822
23	23 4 25.8	+0.9596	5444	−1930
25	23 15 44.0	−0.4286	5411	−1922
28	25 21 32.8	+0.9697	5340	−1633
29	26 1 26.6	−0.7360	5339	−1598
30	27 0 26.8	−0.5950	5348	−1361
31	27 16 10.1	+0.3944	5366	−1170

Elemente der Stern-Bedeckungen 1902.

Nr.	Zeit der Conj. in AR.			q	p'	q'
	d	h	m			
	März					
34	1	7	44.2	+0.7922	5420	—0605
35	1	13	33.9	+1.1320	5431	—0513
38	5	1	39.2	+0.7080	5520	+0876
40	5	11	27.2	—0.1743	5522	+1028
41	5	18	42.0	—0.0384	5525	+1136
42	6	5	31.1	+0.5644	5528	+1289
43	7	4	19.6	+0.3040	5535	+1574
5	15	2	47.7	+1.0248	5970	+0552
6	15	4	1.6	—0.1800	5970	+0526
7	15	13	7.3	+0.5039	5972	+0332
8	15	19	31.5	+0.8343	5973	+0194
9	15	19	39.9	—0.9598	5973	+0191
10	16	5	27.6	+0.9144	5961	—0021
12	16	14	21.1	—0.9522	5946	—0212
13	16	18	11.8	—0.9310	5939	—0293
15	17	9	55.4	+0.7996	5892	—0614
16	18	0	45.5	+0.7288	5836	—0894
17	18	7	18.5	+0.8044	5808	—1009
18	19	20	26.6	—0.0571	5639	—1536
19	20	0	39.0	+0.5086	5620	—1581
20	20	16	1.2	—1.2803	5555	—1721
21	21	0	57.6	—0.9410	5520	—1783
23	22	12	25.6	+0.9616	5415	—1901
25	22	23	50.7	—0.4126	5394	—1896
28	25	5	46.6	+1.0836	5362	—1626
29	25	9	39.6	—0.6184	5363	—1591
30	26	8	33.3	—0.4475	5380	—1357
31	27	0	11.5	+0.5576	5396	—1167
34	28	15	37.1	+0.9810	5435	—0602
	April					
38	1	10	18.0	+0.8882	5466	+0862
39	1	10	21.6	—1.1704	5466	+0862
40	1	20	16.0	—0.0064	5466	+1010
41	2	3	38.5	+0.1246	5467	+1116
42	2	14	39.1	+0.7215	5470	+1266
43	3	13	50.5	+0.4344	5482	+1547
44	4	3	14.3	—1.0714	5496	+1683

Nr.	Zeit der Conj. in AR.			q	p'	q'
	d	h	m			
	April					
45	4	6	39.6	+0.8136	5503	+1715
46	4	15	17.8	—0.3334	5516	+1786
47	5	7	27.0	+0.2916	5551	+1893
4	11	8	50.2	+1.2388	6072	+0577
5	11	9	49.3	+0.9056	6070	+0555
6	11	11	1.0	—0.2828	6070	+0529
7	11	19	50.9	+0.3876	6069	+0333
8	12	2	4.5	+0.7116	6061	+0193
9	12	2	12.7	—1.0596	6060	+0190
10	12	11	45.4	+0.7884	6042	—0024
12	12	20	26.6	—1.0586	6014	—0215
13	13	0	12.5	—1.0385	6002	—0297
15	13	15	39.4	+0.6744	5936	—0618
16	14	6	18.7	+0.6072	5861	—0896
17	14	12	48.5	+0.6844	5823	—1008
18	16	1	56.0	—0.1598	5613	—1522
19	16	6	10.1	+0.4090	5591	—1566
21	17	6	43.2	—1.0297	5477	—1761
23	18	18	41.3	+0.9112	5368	—1876
25	19	6	16.4	—0.4612	5348	—1872
28	21	12	48.9	+1.0867	5348	—1613
29	21	16	43.6	—0.6192	5350	—1580
30	22	15	43.6	—0.4320	5380	—1351
31	23	7	23.5	+0.5842	5402	—1163
34	24	22	47.7	+1.0246	5452	—0601
38	28	17	52.8	+0.9428	5434	+0855
39	28	17	56.5	—1.1305	5434	+0856
40	29	3	59.7	+0.0407	5424	+1001
41	29	11	29.6	+0.1716	5420	+1104
42	29	22	42.7	+0.7719	5414	+1250
43	30	22	24.6	+0.4772	5412	+1525
	Mai					
44	1	12	7.9	—1.0484	5424	+1658
45	1	15	38.2	+0.8553	5426	+1688
46	2	0	29.3	—0.3062	5440	+1759
47	2	17	1.9	+0.3199	5476	+1865
48	3	16	8.7	—0.9074	5556	+1946

Elemente der Stern-Bedeckungen 1902.

Nr.	Zeit der Conj. in AR. d	h	m	q	p'	q'
	Mai					
49	3	23	6.9	−0.0812	5586	+1952
1	5	4	49.6	−0.2358	5742	+1877
2	5	10	58.9	+0.5958	5780	+1839
10	9	20	23.7	+0.7805	6152	−0023
12	10	4	47.4	−1.0365	6128	−0218
13	10	8	25.6	−1.0162	6115	−0301
15	10	23	21.3	+0.6722	6044	−0627
16	11	13	32.1	+0.6087	5957	−0908
17	11	19	50.0	+0.6864	5917	−1023
18	13	8	1.3	−0.1399	5665	−1535
19	13	12	10.5	+0.4236	5638	−1578
21	14	12	23.0	−1.0012	5494	−1766
23	16	0	12.3	+0.9324	5352	−1871
25	16	11	49.2	−0.4390	5326	−1865
28	18	18	45.7	+1.0995	5314	−1607
29	18	22	42.4	−0.6118	5317	−1574
30	19	21	53.5	−0.4333	5356	−1350
31	20	13	39.3	+0.5784	5386	−1164
34	22	5	10.8	+0.9983	5458	−0607
38	26	0	16.4	+0.8665	5434	+0850
39	26	0	20.0	−1.2166	5434	+0851
40	26	10	26.2	−0.0451	5420	+0995
41	26	17	59.2	+0.0828	5408	+1097
42	27	5	18.5	+0.6826	5392	+1242
43	28	5	20.0	+0.3782	5370	+1510
44	28	19	18.9	−1.1662	5366	+1639
45	28	22	53.8	+0.7576	5368	+1668
46	29	7	57.0	−0.4180	5374	+1737
47	30	0	55.4	+0.2162	5398	+1839
48	31	0	42.8	−1.0222	5465	+1916
49	31	7	53.8	−0.1816	5492	+1924
	Juni					
1	1	14	29.8	−0.3196	5654	+1855
2	1	20	49.1	+0.5264	5693	+1818
16	7	22	56.0	+0.6922	6062	−0914
17	8	5	2.0	+0.7753	6024	−1032
18	9	16	1.0	−0.0056	5766	−1556
19	9	20	2.1	+0.5527	5736	−1600
20	10	10	49.4	−1.1792	5632	−1732
21	10	19	30.2	−0.8374	5576	−1788
23	12	6	29.2	+1.0814	5396	−1888
25	12	17	54.7	−0.2783	5358	−1879
28	15	0	29.6	+1.2237	5302	−1611
29	15	4	26.4	−0.4869	5304	−1579
30	16	3	40.8	−0.3332	5335	−1355
31	16	19	30.4	+0.6590	5364	−1172
34	18	11	11.0	+1.0250	5444	−0620
38	22	6	6.2	+0.7558	5458	+0839
40	22	16	13.4	−0.1707	5442	+0985
41	22	23	44.7	−0.0533	5430	+1088
42	23	11	1.9	+0.5321	5410	+1233
43	24	11	3.2	+0.1989	5378	+1501
45	25	4	41.7	+0.5636	5359	+1657
46	25	13	49.3	−0.6268	5358	+1724
47	26	7	0.1	+0.0016	5364	+1822
48	27	7	14.4	−1.2567	5406	+1894
49	27	14	35.6	−0.4066	5426	+1900
1	28	22	4.8	−0.5326	5562	+1830
2	29	4	36.6	+0.3316	5596	+1794
	Juli					
♀	2	10	53.8	−0.6869	5639	+0608
4	2	15	20.7	+1.1684	6118	+0614
5	2	16	18.9	+0.8406	6122	+0593
6	2	17	29.3	−0.3340	6128	+0567
19	7	5	40.3	+0.7068	5825	−1608
20	7	20	2.7	−0.9788	5725	−1746
21	8	4	28.3	−0.6274	5669	−1806
22	9	8	9.8	−1.3243	5509	−1906
23	9	14	25.6	+1.3078	5480	−1910
24	9	16	5.6	−1.1858	5472	−1909
25	10	1	32.5	−0.0266	5434	−1901
29	12	10	57.2	−0.2356	5328	−1593
30	13	10	0.1	−0.1022	5340	−1366
31	14	1	46.1	+0.8682	5360	−1183

Elemente der Stern-Bedeckungen 1902.

Nr.	Zeit der Conj. in AR.	q	p'	q'	Nr.	Zeit der Conj. in AR.	q	p'	q'
	Juli					Aug.			
	d h m					d h m			
32	15 8 40.2	—1.2714	5414	—0765	42	16 23 56.9	+0.4806	5464	+1202
34	15 17 27.2	+1.1769	5430	—0635	43	17 23 31.6	+0.0454	5448	+1478
38	19 12 15.8	+0.7278	5478	+0821	45	18 16 47.4	+0.3343	5441	+1641
40	19 22 18.8	—0.2184	5468	+0968	46	19 1 43.1	—0.8854	5440	+1710
41	20 5 46.4	—0.1174	5460	+1073	47	19 18 32.3	—0.3254	5444	+1812
42	20 16 57.7	+0.4424	5446	+1220	49	21 1 39.1	—0.8324	5479	+1891
43	21 16 45.1	+0.0602	5415	+1492	1	22 9 6.5	—1.0240	5558	+1812
45	22 10 13.8	+0.3907	5398	+1650	2	22 15 42.5	—0.1608	5578	+1775
46	22 19 17.1	—0.8152	5391	+1718	3	22 20 38.9	+1.0242	5598	+1742
47	23 12 21.9	—0.2149	5389	+1816	4	26 5 43.5	+0.7828	5937	+0620
49	24 19 57.6	—0.6624	5425	+1890	5	26 6 45.2	+0.4494	5940	+0599
1	26 3 46.7	—0.8072	5522	+1814	6	26 7 59.8	—0.7528	5946	+0576
2	26 10 25.3	+0.0645	5550	+1777	7	26 17 9.3	—0.0166	5970	+0388
3	26 15 23.2	+1.2547	5573	+1745	8	26 23 33.8	+0.3506	5986	+0254
4	29 23 37.0	+1.0016	6013	+0620	10	27 9 26.2	+0.4904	6002	+0044
5	30 0 37.1	+0.6705	6016	+0600	13	27 21 59.0	—1.2542	6010	—0225
6	30 1 50.0	—0.5196	6022	+0574	15	28 13 18.3	+0.5672	6000	—0549
7	30 10 45.2	+0.1998	6056	+0385	16	29 3 36.3	+0.6056	5972	—0835
8	30 16 59.0	+0.5557	6076	+0248	17	29 9 52.7	+0.7288	5956	—0954
9	30 17 7.2	—1.2116	6076	+0245					
10	31 2 34.4	+0.6814	6096	+0032		Sept.			
12	31 11 5.0	—1.0997	6105	—0161	29	5 3 31.0	+0.2534	5442	—1612
13	31 14 44.5	—1.0566	6107	—0244	30	6 1 51.2	+0.4075	5430	—1383
					32	7 23 37.6	—0.7636	5440	—0778
	Aug.				36	8 22 35.3	—0.9337	5448	—0428
15	1 5 35.9	+0.7162	6097	—0575	38	12 3 25.2	+0.9988	5452	+0783
22	5 17 37.0	—1.1167	5582	—1913	39	12 3 28.8	—1.0750	5452	+0784
24	6 1 22.6	—0.9638	5546	—1919	40	12 13 29.8	+0.0204	5451	+0930
25	6 10 36.7	+0.2015	5509	—1912	41	12 20 57.7	+0.0944	5450	+1034
29	8 18 45.7	+0.0502	5386	—1606	42	13 8 7.6	+0.6104	5448	+1182
30	9 17 26.4	+0.1844	5378	—1377	43	14 7 43.3	+0.1367	5448	+1460
31	10 9 1.4	+1.1440	5385	—1193	45	15 0 55.4	+0.3936	5454	+1626
32	11 15 43.7	—1.0069	5414	—0775	46	15 9 47.5	—0.8372	5460	+1698
36	12 14 47.7	—1.1716	5442	—0424	47	16 2 26.7	—0.3104	5478	+1805
38	15 19 22.4	+0.8278	5476	+0800	49	17 9 4.4	—0.8688	5538	+1893
39	15 19 26.0	—1.2453	5478	+0801	1	18 15 53.0	—1.1084	5630	+1821
40	16 5 23.7	—0.1370	5474	+0948	2	18 22 20.3	—0.2624	5654	+1784
41	16 12 49.5	—0.0525	5470	+1053	3	19 3 10.2	+0.9055	5672	+1752

Elemente der Stern-Bedeckungen 1902.

Nr.	Zeit der Conj. in AR.	q	p'	q'
	Sept.			
	d h m			
4	22 11 3.7	+0.6139	5953	+0619
5	22 12 5.2	+0.2807	5954	+0599
6	22 13 19.7	−0.9208	5958	+0574
7	22 22 29.2	−0.1855	5970	+0388
8	23 4 54.9	+0.1829	5976	+0255
10	23 14 51.1	+0.3255	5978	+0046
15	24 19 5.4	+0.4168	5943	−0537
16	25 9 40.4	+0.4661	5903	−0817
17	25 16 5.1	+0.5961	5882	−0933
18	27 4 9.4	+0.0726	5745	−1473
19	27 8 13.1	+0.6670	5728	−1521
20	27 23 1.4	−0.9572	5672	−1670
21	28 7 36.9	−0.5468	5640	−1738
	Oct.			
30	3 10 25.5	+0.4978	5464	−1383
32	5 7 51.0	−0.6436	5472	−0779
36	6 6 40.8	−0.8076	5470	−0428
38	9 11 45.8	+1.1198	5420	+0775
39	9 11 49.5	−0.9618	5420	+0776
40	9 21 57.1	+0.1334	5412	+0918
41	10 5 30.4	+0.2041	5408	+1021
42	10 16 48.7	+0.7160	5402	+1166
43	11 16 42.5	+0.2252	5402	+1441
45	12 10 6.1	+0.4697	5415	+1607
46	12 19 3.1	−0.7707	5427	+1680
47	13 11 48.5	−0.2566	5448	+1789
49	14 18 25.4	−0.8382	5548	+1888
1	16 0 54.3	−1.0982	5674	+1828
2	16 7 15.1	−0.2637	5706	+1794
3	16 11 59.6	+0.8897	5728	+1762
4	19 17 48.0	+0.5595	6044	+0626
5	19 18 47.8	+0.2302	6046	+0605
6	19 20 0.4	−0.9568	6049	+0580
7	20 4 55.5	−0.2325	6056	+0391
8	20 11 11.7	+0.1307	6056	+0256
10	20 20 54.4	+0.2708	6049	+0046
15	22 0 40.0	+0.3623	5983	−0540

Nr.	Zeit der Conj. in AR.	q	p'	q'
	Oct.			
	d h m			
16	22 15 7.0	+0.4138	5922	−0818
17	22 21 29.8	+0.5448	5892	−0933
18	24 9 40.6	+0.0301	5710	−1460
19	24 13 46.8	+0.6276	5689	−1507
20	25 4 46.4	−0.9992	5621	−1651
21	25 13 29.9	−0.5848	5584	−1717
22	26 17 48.5	−1.1105	5492	−1844
24	27 1 48.7	−0.9218	5474	−1856
25	27 11 17.1	+0.2970	5458	−1858
	Nov.			
36	2 14 23.1	−0.8182	5492	−0431
38	5 19 32.4	+1.0990	5401	+0770
39	5 19 36.1	−0.9927	5401	+0771
40	6 5 49.3	+0.1058	5387	+0912
41	6 13 27.7	+0.1754	5374	+1013
42	7 0 55.2	+0.6890	5360	+1156
43	8 1 13.9	+0.1910	5344	+1424
45	8 18 59.2	+0.4360	5347	+1586
46	9 4 7.9	−0.8152	5354	+1658
47	9 21 15.7	−0.2959	5384	+1766
49	11 4 29.3	−0.8750	5486	+1869
1	12 11 21.1	−1.1208	5644	+1822
2	12 17 44.1	−0.2816	5682	+1790
3	12 22 29.7	+0.8741	5712	+1762
4	16 3 12.0	+0.5848	6139	+0642
5	16 4 10.1	+0.2607	6143	+0622
6	16 5 20.5	−0.9090	6146	+0596
7	16 13 59.2	−0.1884	6160	+0405
8	16 20 3.1	+0.1734	6166	+0268
10	17 5 26.2	+0.3175	6164	+0053
15	18 8 13.6	+0.4243	6094	−0545
16	18 22 11.3	+0.4832	6026	−0828
17	19 4 21.8	+0.6156	5990	−0944
18	20 15 35.2	+0.1229	5766	−1474
19	20 19 36.4	+0.7156	5741	−1520
20	21 10 21.6	−0.8952	5651	−1660
21	21 18 59.2	−0.4838	5602	−1723

Elemente der Stern-Bedeckungen 1902.

Nr.	Zeit der Conj. in AR.	q	p'	q'	Nr.	Zeit der Conj. in AR.	q	p'	q'
	Nov.					Dec.			
	d h m					d h m			
22	22 23 10.8	−1.0140	5476	−1841	5	13 15 27.2	+0.2566	6157	+0643
24	23 7 12.1	−0.8294	5451	−1852	6	13 16 37.2	−0.9064	6162	+0618
25	23 16 43.3	+0.3855	5425	−1852	7	14 1 11.4	−0.1712	6194	+0427
29	26 1 50.2	+0.3664	5390	−1594	8	14 7 10.7	+0.2002	6212	+0290
30	27 0 30.6	+0.5224	5415	−1380	10	14 16 24.3	+0.3614	6225	+0074
	Dec.				15	15 18 31.3	+0.5164	6197	−0536
38	3 2 18.8	+0.9630	5414	+0762	16	16 8 1.6	+0.5988	6140	−0827
39	3 2 22.5	−1.1361	5412	+0763	17	16 13 58.9	+0.7394	6111	−0946
40	3 12 36.7	−0.0437	5392	+0904	18	17 23 51.5	+0.3082	5888	−1494
41	3 20 16.6	+0.0194	5375	+1003	19	18 3 43.4	+0.8956	5860	−1540
42	4 7 47.7	+0.5263	5354	+1146	20	18 17 55.4	−0.6706	5761	−1684
43	5 8 20.9	+0.0092	5314	+1411	21	19 2 14.6	−0.2586	5706	−1748
45	6 2 23.3	+0.2493	5299	+1569	22	20 5 34.6	−0.7669	5546	−1864
46	6 11 43.1	−1.0186	5299	+1638	24	20 13 24.1	−0.5836	5509	−1872
47	7 5 15.4	−0.4948	5313	+1743	25	20 22 43.2	+0.6170	5474	−1870
49	8 13 24.0	−1.0716	5393	+1842	29	23 7 19.9	+0.5650	5375	−1601
1	9 21 14.5	−1.2904	5546	+1801	30	24 6 4.9	+0.6912	5385	−1388
2	10 3 49.2	−0.4324	5589	+1772	32	26 4 17.6	−0.5898	5446	−0807
3	10 8 43.1	+0.7430	5621	+1745	36	27 3 17.5	−0.8296	5472	−0462
4	13 14 29.5	+0.5780	6152	+0664	42	31 13 46.5	+0.3508	5376	+1133

Stern-Bedeckungen für Berlin 1902.

Tag		Nr.	Name	Eintritt mittl. Zeit	Q_1	Austritt mittl. Zeit	Q_2	Bemerkungen	
				h m	°	h m	°		h m
Jan.	12	45	c^1 Capricorni	5 23.5	83.5	6 26.5	229.4	☾ Untg.	7 34
	13	47	ϰ Aquarii . .	7 20.2	19.4	8 1.6	295.2	☾ Untg.	8 46
	22	17	68 Geminorum	17 43.2	144.2	18 21.8	243.0	☾ Untg.	18 58
	24	19	ϰ Cancri . .	7 1.4	113.4	7 58.8	274.4	☾ Aufg.	5 40
	26	23	p^5 Leonis . .	19 37.6	71.1	20 23.6	330.9	☾ Untg.	20 53
	29	28	α Virginis .	11 21.2	128.8	12 21.2	274.3	☾ Aufg.	11 38
Febr.	12	2	ε Piscium .	8 36.9	119.4	9 16.9	207.1	☾ Untg.	10 20
	16	7	*i* Tauri . . .	7 37.1	128.2	8 33.1	226.9	☾ i. Mer.	7 0
	16	8	*m* Tauri . . .	14 56.5	152.3	15 20.7	212.1	☾ Untg.	15 8
März	17	15	26 Geminorum	10 20.0	121.3	11 19.8	261.8	☾ Untg.	14 50
	18	17	68 Geminorum	6 53.3	157.8	7 36.3	227.4	☾ i. Mer.	7 48
	22	23	p^5 Leonis . .	12 24.7	131.2	13 35.9	279.9	☾ i. Mer.	11 8
	28	34	ν Scorpii . .	14 53.5	107.1	16 16.9	271.3	☾ i. Mer.	15 44
April	11	5	δ^3 Tauri . . .	10 22.2	116.3	11 5.2	241.8	☾ Untg.	10 48
	14	17	68 Geminorum	13 28.3	41.0	13 51.9	343.4	☾ Untg.	13 31
	21	28	α Virginis .	12 53.8	134.8	14 4.0	265.5	☾ i. Mer.	11 21
Mai	1	45	c^1 Capricorni	14 12.3	44.1	15 9.7	282.1	☾ Aufg.	13 50
Juni	18	34	ν Scorpii . .	10 52.1	110.8	12 12.5	262.6	☾ i. Mer.	10 20
Juli	2	5	δ^3 Tauri . . .	14 53.4	83.0	15 44.8	257.4	☾ Aufg.	13 52
	19	38	ρ^1 Sagittarii .	12 10.1	36.7	13 12.1	295.6	☾ i. Mer.	11 27
	30	8	*m* Tauri . . .	15 40.0	52.0	16 31.4	293.0	☉ Aufg.	16 18
Aug.	10	31	α Librae . .	9 44.9	144.7	10 31.9	233.9	☾ Untg.	10 12
	28	15	26 Geminorum	12 9.2	37.3	12 38.0	324.7	☾ Aufg.	12 29
Sept.	22	4	δ^1 Tauri . . .	9 48.9	29.4	10 23.1	309.9	☾ Aufg.	8 31
	25	17	68 Geminorum	14 39.1	97.1	15 43.1	275.3	☾ Aufg.	11 29
Oct.	12	45	c^1 Capricorni	10 49.7	356.3	11 13.3	317.8	☾ Untg.	13 37
	16	3	ζ^1 Piscium .	11 34.5	113.3	12 25.1	201.2	☾ i. Mer.	11 30
	19	4	δ^1 Tauri . . .	18 12.8	75.5	19 12.6	280.3	☉ Aufg.	18 34
	22	16	λ Geminorum	13 56.0	61.8	14 52.8	310.6	☾ i. Mer.	17 15
	24	19	ϰ Cancri . .	12 14.9	103.6	13 10.5	280.0	☾ Aufg.	11 45
Nov.	23	25	υ Leonis . .	15 18.3	58.2	15 57.5	346.4	☾ Aufg.	13 15
Dec.	10	3	ζ^1 Piscium .	8 22.3	84.5	9 33.1	230.5	☾ i. Mer.	7 53
	13	4	δ^1 Tauri . . .	14 56.3	77.4	15 54.0	278.1	☾ Untg.	18 40
	16	16	λ Geminorum	6 38.2	71.6	7 25.8	295.0	☾ Aufg.	5 54
	16	17	68 Geminorum	13 35.9	133.1	14 36.7	251.3	☾ i. Mer.	13 49

TRABANT I.

Geoc. Obere Conj. Mittlere Zeit	h	m	b/a	Geoc. Obere Conj. Mittlere Zeit	h	m	b/a	Geoc. Obere Conj. Mittlere Zeit	h	m	b/a
Jan. 1	10	57.4	−0.0221	März 22	3	39.3	−0.0102	Juni 9	19	8.6	−0.0007
3	5	27.9	218	23	22	9.0	99	11	13	35.9	06
4	23	58.4	216	25	16	38.7	97	13	8	3.1	05
6	18	28.9	214	27	11	8.4	94	15	2	30.2	04
8	12	59.4	211	29	5	38.0	91	16	20	57.2	04
10	7	29.9	209	31	0	7.6	89	18	15	24.2	03
12	2	0.3	207	April 1	18	37.1	86	20	9	51.1	02
13	20	30.8	205	3	13	6.6	83	22	4	18.0	01
15	15	1.2	202	5	7	36.1	81	23	22	44.8	−0.0001
17	9	31.7	199	7	2	5.5	78	25	17	11.5	00
19	4	2.1	197	8	20	34.9	75	27	11	38.1	00
20	22	32.6	194	10	15	4.3	73	29	6	4.7	+0.0001
22	17	3.1	192	12	9	33.6	71	Juli 1	0	31.3	01
24	11	33.5	189	14	4	2.9	68	2	18	57.8	02
26	6	3.9	186	15	22	32.1	66	4	13	24.2	02
28	0	34.4	183	17	17	1.2	63	6	7	50.6	02
29	19	4.8	181	19	11	30.3	61	8	2	16.9	02
31	13	35.2	178	21	5	59.4	59	9	20	43.2	02
Febr. 2	8	5.6	176	23	0	28.4	56	11	15	9.5	02
4	2	36.0	173	24	18	57.3	54	13	9	35.8	02
5	21	6.4	170	26	13	26.2	52	15	4	2.0	02
7	15	36.8	168	28	7	55.0	50	16	22	28.1	01
9	10	7.2	165	30	2	23.8	47	18	16	54.2	01
11	4	37.5	162	Mai 1	20	52.5	45	20	11	20.2	+0.0001
12	23	7.8	160	3	15	21.2	43	22	5	46.2	00
14	17	38.1	157	5	9	49.8	41	24	0	12.3	00
16	12	8.3	154	7	4	18.3	38	25	18	38.3	00
18	6	38.6	152	8	22	46.8	36	27	13	4.3	−0.0001
20	1	8.9	149	10	17	15.3	34	29	7	30.2	02
21	19	39.1	146	12	11	43.7	32	31	1	56.2	02
23	14	9.3	143	14	6	12.0	30	Aug. 1	20	22.2	03
25	8	39.5	140	16	0	40.2	28	3	14	48.2	03
27	3	9.6	137	17	19	8.3	26	5	9	14.1	04
28	21	39.7	135	19	13	36.4	24	7	3	40.1	05
März 2	16	9.8	132	21	8	4.5	23	8	22	6.1	05
4	10	39.9	129	23	2	32.5	21	10	16	32.1	06
6	5	10.0	127	24	21	0.4	19	12	10	58.1	07
7	23	40.1	124	26	15	28.3	17	14	5	24.1	08
9	18	10.1	121	28	9	56.1	16	15	23	50.1	09
11	12	40.1	118	30	4	23.8	15	17	18	16.2	09
13	7	10.0	115	31	22	51.4	13	19	12	42.3	10
15	1	39.9	112	Juni 2	17	18.9	12	21	7	8.4	11
16	20	9.8	110	4	11	46.4	11	23	1	34.6	12
18	14	39.7	107	6	6	13.9	09	24	20	0.8	13
20	9	9.5	104	8	0	41.3	08	26	14	27.1	14

TRABANT I. (Fortsetzung.)

Geoc. Obere Conj. Mittlere Zeit		h	m	b/a	Geoc. Obere Conj. Mittlere Zeit		h	m	b/a	Geoc. Obere Conj. Mittlere Zeit		h	m	b/a
Aug.	28	8	53.5	−0.0015	Oct.	9	19	44.3	−0.0030	Nov.	21	7	15.1	−0.0018
	30	3	19.9	16		11	14	12.3	30		23	1	44.6	17
	31	21	46.3	16		13	8	40.4	30		24	20	14.2	16
Sept.	2	16	12.8	17		15	3	8.6	30		26	14	43.8	15
	4	10	39.3	18		16	21	36.8	30		28	9	13.5	14
	6	5	5.9	19		18	16	5.1	30		30	3	43.2	12
	7	23	32.5	20		20	10	33.5	30	Dec.	1	22	12.9	11
	9	17	59.2	21		22	5	2.0	30		3	16	42.7	09
	11	12	26.0	22		23	23	30.5	30		5	11	12.5	07
	13	6	52.8	23		25	17	59.1	30		7	5	42.4	06
	15	1	19.7	24		27	12	27.7	29		9	0	12.3	05
	16	19	46.7	24		29	6	56.4	29		10	18	42.2	03
	18	14	13.8	25		31	1	25.2	28		12	13	12.1	−0.0001
	20	8	41.0	25	Nov.	1	19	54.1	28		14	7	42.1	+0.0001
	22	3	8.2	26		3	14	23.0	27		16	2	12.1	03
	23	21	35.5	27		5	8	52.0	26		17	20	42.2	05
	25	16	2.8	27		7	3	21.0	26		19	15	12.3	07
	27	10	30.2	28		8	21	50.1	25		21	9	42.4	09
	29	4	57.7	29		10	16	19.2	24		23	4	12.6	11
	30	23	25.3	29		12	10	48.4	23		24	22	42.8	13
Oct.	2	17	52.9	29		14	5	17.6	22		26	17	13.0	16
	4	12	20.6	30		15	23	46.9	21		28	11	43.2	18
	6	6	48.4	30		17	18	16.2	20		30	6	13.4	20
	8	1	16.3	30		19	12	45.6	19		32	0	43.7	22

TRABANT II.

Geoc. Obere Conj. Mittlere Zeit		h	m	b/a	Geoc. Obere Conj. Mittlere Zeit		h	m	b/a	Geoc. Obere Conj. Mittlere Zeit		h	m	b/a
Jan.	3	12	33.7	−0.0218	März	12	3	29.3	−0.0117	Mai	18	16	44.2	−0.0025
	7	2	0.1	213		15	16	52.4	112		22	5	59.3	22
	10	15	25.6	209		19	6	15.2	106		25	19	13.8	18
	14	4	51.9	204		22	19	37.6	101		29	8	27.8	15
	17	18	17.3	199		26	8	59.8	096	Juni	1	21	41.3	12
	21	7	43.4	194		29	22	21.6	090		5	10	54.2	10
	24	21	8.8	188	April	2	11	43.1	085		9	0	6.5	08
	28	10	34.7	183		6	1	4.3	080		12	13	18.2	06
Febr.	1	0	0.0	178		9	14	25.1	075		16	2	29.4	04
	4	13	25.6	172		13	3	45.5	070		19	15	40.0	02
	8	2	50.6	167		16	17	5.4	065		23	4	50.3	−0.0001
	11	16	15.8	162		20	6	24.9	060		26	17	59.9	0.0000
	15	5	40.7	156		23	19	44.0	055		30	7	9.1	+0.0001
	18	19	5.5	151		27	9	2.6	051	Juli	3	20	17.8	02
	22	8	30.0	145		30	22	20.8	046		7	9	26.1	02
	25	21	54.3	139	Mai	4	11	38.5	042		10	22	34.1	02
März	1	11	18.3	134		8	0	55.6	037		14	11	41.6	02
	5	0	42.2	129		11	14	12.3	033		18	0	49.0	01
	8	14	5.8	123		15	3	28.5	028		21	13	56.0	01

TRABANT II. (Fortsetzung.)

Geoc. Obere Conj. Mittlere Zeit		h	m	b/a	Geoc. Obere Conj. Mittlere Zeit		h	m	b/a	Geoc. Obere Conj. Mittlere Zeit		h	m	b/a
Juli	25	3	2.9	0.0000	Sept.	19	21	14.3	—0.0025	Nov.	15	17	41.4	—0.0022
	28	16	9.6	—0.0001		23	10	26.6	27		19	7	3.4	20
Aug.	1	5	16.2	03		26	23	39.1	28		22	20	24.8	17
	4	18	23.0	04		30	12	52.6	29		26	9	47.6	15
	8	7	29.6	05	Oct.	4	2	6.2	30		29	23	9.8	12
	11	20	36.5	06		7	15	21.1	30	Dec.	3	12	33.4	09
	15	9	43.4	08		11	4	36.1	30		7	1	56.3	06
	18	22	50.8	10		14	17	52.3	30		10	15	20.7	—0.0003
	22	11	58.1	12		18	7	8.5	30		14	4	44.3	+0.0001
	26	1	6.1	14		21	20	26.0	30		17	18	9.2	05
	29	14	14.1	15		25	9	43.4	30		21	7	33.4	09
Sept.	2	3	23.0	17		28	23	2.1	29		24	20	58.8	13
	5	16	32.0	19	Nov.	1	12	20.7	28		28	10	23.5	18
	9	5	41.9	21		5	1	40.5	26		31	23	49.4	22
	12	18	52.0	22		8	15	0.0	25					
	16	8	3.0	24		12	4	20.9	23					

TRABANT III.

		h	m	b/a			h	m	b/a			h	m	b/a
Jan.	2	7	10.0	—0.0220	Mai	4	9	25.9	—0.0042	Sept.	2	21	11.2	—0.0017
	9	11	40.4	210		11	13	25.2	34		10	0	37.4	21
	16	16	11.1	200		18	17	21.0	26		17	4	7.1	24
	23	20	41.4	190		25	21	12.2	19		24	7	41.3	27
	31	1	11.3	179	Juni	2	0	59.4	13	Oct.	1	11	20.1	29
Febr.	7	5	41.3	168		9	4	41.6	08		8	15	3.8	30
	14	10	10.1	157		16	8	18.7	04		15	18	53.0	30
	21	14	38.6	146		23	11	51.1	—0.0001		22	22	46.8	29
	28	19	5.2	135		30	15	19.4	+0.0001		30	2	45.6	28
März	7	23	30.4	124	Juli	7	18	44.2	02	Nov.	6	6	48.2	26
	15	3	53.3	113		14	22	5.6	02		13	10	54.7	23
	22	8	14.4	102		22	1	24.8	+0.0001		20	15	4.6	19
	29	12	33.7	091		29	4	41.5	—0.0001		27	19	18.2	14
April	5	16	50.3	080	Aug.	5	7	57.4	04	Dec.	4	23	35.3	08
	12	21	4.7	070		12	11	13.0	07		12	3	55.0	—0.0001
	20	1	15.3	060		19	14	29.8	10		19	8	17.7	+0.0007
	27	5	22.5	051		26	17	49.1	14		26	12	42.0	16

TRABANT IV.

		h	m	b/a			h	m	b/a			h	m	b/a
Jan.	7	2	22.9	—0.0188	Mai	21	16	59.4	—0.0024	Oct.	1	18	26.7	—0.0019
	23	23	17.1	168	Juni	7	9	52.9	11		18	11	23.4	21
Febr.	9	20	7.7	147		24	1	47.5	—0.0001	Nov.	4	5	19.6	19
	26	16	47.1	126	Juli	10	16	47.5	+0.0003		21	0	9.4	13
März	15	13	9.1	104		27	7	8.1	+0.0002	Dec.	7	19	42.0	—0.0002
April	1	9	5.2	082	Aug.	12	21	13.6	—0.0002		24	15	49.2	+0.0012
	18	4	27.9	061		29	11	32.7	08					
Mai	4	23	8.9	041	Sept.	15	2	31.5	15					

TRABANT I.

Eintritte	h m s	Eintritte	h m s	Eintritte	h m s	Austritte	h m s
Febr. 16	10 27 42	April 24	16 30 13	Juni 30	22 33 31	Sept. 2	18 2 2
18	4 56 16	26	10 58 44	Juli 2	17 2 9	4	12 30 50
19	23 24 45	28	5 27 8	4	11 30 42	6	6 59 35
21	17 53 18	29	23 55 40	6	5 59 21	8	1 28 26
23	12 21 45	Mai 1	18 24 6	8	0 27 53	9	19 57 11
25	6 50 19	3	12 52 38	9	18 56 32	11	14 26 0
27	1 18 48	5	7 21 2	11	13 25 6	13	8 54 46
28	19 47 20	7	1 49 34	13	7 53 47	15	3 23 38
März 2	14 15 47	8	20 18 0	15	2 22 20	16	21 52 24
4	8 44 20	10	14 46 32	16	20 51 0	18	16 21 14
6	3 12 48	12	9 14 57	18	15 19 36	20	10 50 0
7	21 41 20	14	3 43 29	20	9 48 18	22	5 18 53
9	16 9 46	15	22 11 56	22	4 16 52	23	23 47 39
11	10 38 19	17	16 40 28	23	22 45 34	25	18 16 30
13	5 6 46	19	11 8 53	25	17 14 11	27	12 45 17
14	23 35 18	21	5 37 26	27	11 42 55	29	7 14 10
16	18 3 44	23	0 5 53	29	6 11 31	Oct. 1	1 42 57
18	12 32 16	24	18 34 26	31	0 40 14	2	20 11 48
20	7 0 43	26	13 2 52	Aug. 1	19 8 53	4	14 40 36
22	1 29 15	28	7 31 25	3	13 37 38	6	9 9 29
23	19 57 40	30	1 59 53			8	3 38 17
25	14 26 12	31	20 28 26	Austritte		9	22 7 8
27	8 54 39	Juni 2	14 56 52	5	10 22 15	11	16 35 56
29	3 23 10	4	9 25 26	7	4 50 59	13	11 4 49
30	21 51 35	6	3 53 55	8	23 19 39	15	5 33 38
April 1	16 20 7	7	22 22 29	10	17 48 25	17	0 2 28
3	10 48 33	9	16 50 56	12	12 17 4	18	18 31 17
5	5 17 4	11	11 19 31	14	6 45 49	20	13 0 10
6	23 45 28	13	5 48 0	16	1 14 30	22	7 28 59
8	18 14 0	15	0 16 36	17	19 43 17	24	1 57 49
10	12 42 26	16	18 45 4	19	14 11 58	25	20 26 38
12	7 10 57	18	13 13 39	21	8 40 44	27	14 55 31
14	1 39 22	20	7 42 10	23	3 9 27	29	9 24 20
15	20 7 53	22	2 10 46	24	21 38 15	31	3 53 10
17	14 36 19	23	20 39 15	26	16 6 57	Nov. 1	22 21 59
19	9 4 51	25	15 7 52	28	10 35 45	3	16 50 51
21	3 33 15	27	9 36 23	30	5 4 29	5	11 19 39
22	22 1 47	29	4 5 1	31	23 33 18	7	5 48 30

TRABANT I. (Fortsetzung.)

Austritte	h	m	s	Austritte	h	m	s	Austritte	h	m	s	Austritte	h	m	s
Nov. 9	0	17	18	Nov. 23	4	7	50	Dec. 7	7	58	11	Dec. 21	11	48	21
10	18	46	9	24	22	36	40	9	2	27	0	23	6	17	6
12	13	14	58	26	17	5	27	10	20	55	46	25	0	45	52
14	7	43	47	28	11	34	15	12	15	24	32	26	19	14	36
16	2	12	35	30	6	3	2	14	9	53	18	28	13	43	19
17	20	41	26	Dec. 2	0	31	51	16	4	22	5	30	8	12	4
19	15	10	14	3	19	0	38	17	22	50	51	32	2	40	49
21	9	39	3	5	13	29	25	19	17	19	36				

TRABANT II.

Eintritte	h	m	s	Eintritte	h	m	s	Austritte	h	m	s	Austritte	h	m	s
Febr. 18	16	29	18	Mai 14	23	22	6	Aug. 8	9	4	17	Oct. 22	0	30	56
22	5	46	51	18	12	39	0	11	22	22	7	25	13	49	31
25	19	4	37	22	1	55	52	15	11	39	54	29	3	8	56
März 1	8	22	6	25	15	12	46	19	0	57	53	Nov. 1	16	27	33
4	21	39	44	29	4	29	39	22	14	15	47	5	5	47	4
8	10	57	8	Juni 1	17	46	33	26	3	33	55	8	19	5	43
12	0	14	39	5	7	3	28	29	16	51	55	12	8	25	18
15	13	31	58	8	20	20	24	Sept. 2	6	10	13	15	21	43	58
19	2	49	22	12	9	37	21	5	19	28	19	19	11	3	37
22	16	6	37	15	22	54	19	9	8	46	47	23	0	22	18
26	5	23	54	19	12	11	19	12	22	4	58	26	13	42	0
29	18	41	6	23	1	28	20	16	11	23	36	30	3	0	42
April 2	7	58	17	26	14	45	25	20	0	41	52	Dec. 3	16	20	26
5	21	15	24	30	4	2	30	23	14	0	39	7	5	39	7
9	10	32	30	Juli 3	17	19	39	27	3	19	0	10	18	58	52
12	23	49	34	7	6	36	49	30	16	37	55	14	8	17	33
16	13	6	36	10	19	54	3	Oct. 4	5	56	21	17	21	37	19
20	2	23	37	14	9	11	19	7	19	15	24	21	10	55	58
23	15	40	35	17	22	28	39	11	8	33	54	25	0	15	44
27	4	57	33	21	11	46	1	14	21	53	5	28	13	34	21
30	18	14	29	25	1	3	27	18	11	11	38	32	2	54	5
Mai 4	7	31	25	28	14	20	57								
7	20	48	19	Aug. 1	3	38	29								
11	10	5	13	4	16	56	8								

TRABANT III.

Mitte der Verfinsterung		Halbe Dauer	Mitte der Verfinsterung		Halbe Dauer
	h m s	h m s		h m s	h m s
Febr. 21	12 4 47	1 41 51	Juli 29	3 57 19	1 46 21
28	16 4 21	1 42 10	Aug. 5	7 57 40	1 46 25
März 7	20 3 51	1 42 28	12	11 57 52	1 46 29
15	0 3 0	1 42 46	19	15 58 17	1 46 33
22	4 2 9	1 43 3	26	19 59 18	1 46 35
29	8 1 43	1 43 19	Sept. 3	0 0 17	1 46 37
April 5	12 1 11	1 43 35	10	4 1 53	1 46 39
12	16 1 12	1 43 50	17	8 2 56	1 46 39
19	20 0 36	1 44 5	24	12 3 59	1 46 39
26	23 59 59	1 44 19	Oct. 1	16 4 53	1 46 39
Mai 4	3 59 4	1 44 32	8	20 5 56	1 46 37
11	7 58 14	1 44 45	16	0 7 32	1 46 35
18	11 57 53	1 44 57	23	4 8 59	1 46 33
25	15 57 28	1 45 8	30	8 10 56	1 46 30
Juni 1	19 57 39	1 45 19	Nov. 6	12 12 15	1 46 26
8	23 57 15	1 45 29	13	16 13 29	1 46 21
16	3 56 54	1 45 38	20	20 14 30	1 46 16
23	7 56 20	1 45 47	28	0 15 36	1 46 10
30	11 55 56	1 45 55	Dec. 5	4 17 12	1 46 4
Juli 7	15 56 6	1 46 2	12	8 18 32	1 45 57
14	19 56 15	1 46 9	19	12 20 19	1 45 49
21	23 57 3	1 46 15	26	16 21 24	1 45 41

TRABANT IV.

Mitte der Verfinsterung		Halbe Dauer	Mitte der Verfinsterung		Halbe Dauer
	h m s	h m s		h m s	h m s
Febr. 26	10 3 51	2 4 51	Aug. 12	23 5 18	2 20 31
März 15	4 9 20	2 7 14	29	17 14 40	2 21 6
31	22 14 27	2 9 26	Sept. 15	11 24 49	2 21 29
April 17	16 19 20	2 11 27	Oct. 2	5 36 3	2 21 42
Mai 4	10 24 45	2 13 17	18	23 47 21	2 21 44
21	4 30 6	2 14 57	Nov. 4	17 59 2	2 21 35
Juni 6	22 35 37	2 16 25	21	12 11 22	2 21 15
23	16 42 6	2 17 42	Dec. 8	6 23 11	2 20 44
Juli 10	10 48 57	2 18 49	25	0 35 0	2 20 2
27	4 56 28	2 19 45			

Lage und Gröfse des Saturns-Ringes 1902

nach

Bessel.

0^h	p	l	a	b	u	u'
	° ′	° ′	″	″	° ′	° ′
Jan. 2	7 15.2	+24 3.1	34.04	+13.87	345 2.9	302 49.9
18	7 18.2	23 34.4	34.05	13.61	347 2.7	304 49.8
Febr. 3	7 20.6	23 4.7	34.26	13.43	348 59.0	306 46.2
19	7 22.3	22 35.8	34.68	13.32	350 47.0	308 34.3
März 7	7 23.3	22 9.3	35.28	13.30	352 22.2	310 9.5
23	7 23.9	+21 46.9	36.05	+13.38	353 40.4	311 27.8
April 8	7 24.2	21 30.2	36.95	13.55	354 38.2	312 25.7
24	7 24.3	21 20.6	37.95	13.81	355 12.6	313 0.2
Mai 10	7 24.4	21 18.9	38.97	14.17	355 22.2	313 9.8
26	7 24.4	21 25.2	39.94	14.59	355 6.5	312 54.2
Juni 11	7 24.4	+21 38.8	40.76	+15.04	354 27.7	312 15.5
27	7 24.2	21 57.9	41.35	15.47	353 30.3	311 18.2
Juli 13	7 23.8	22 20.2	41.63	15.82	352 21.1	310 9.0
29	7 23.1	22 42.6	41.56	16.04	351 8.8	308 56.8
Aug. 14	7 22.3	23 2.7	41.15	16.11	350 2.8	307 50.8
30	7 21.5	+23 18.1	40.46	+16.00	349 11.5	306 59.7
Sept. 15	7 21.1	23 27.3	39.56	15.75	348 41.7	306 29.9
Oct. 1	7 21.0	23 29.6	38.56	15.37	348 37.1	306 25.4
17	7 21.4	23 24.7	37.55	14.92	348 59.0	306 47.4
Nov. 2	7 22.3	23 12.8	36.59	14.42	349 46.2	307 34.7
18	7 23.2	+22 54.1	35.75	+13.91	350 56.0	308 44.5
Dec. 4	7 24.2	22 29.5	35.06	13.41	352 24.2	310 12.7
20	7 24.9	21 59.7	34.56	12.94	354 6.2	311 54.9
36	7 25.1	21 25.7	34.25	12.51	355 57.2	313 46.0

p . . . Winkel der kleinen Axe der Ring-Ellipse mit dem Declinations-Kreise; östlich positiv, westlich negativ.

l . . . Erhöhungs-Winkel der Erde über der Ring-Ebene vom Saturn aus gesehen; nördlich positiv, südlich negativ.

a . . . Grofse Axe der Ring-Ellipse.

b . . . Kleine Axe der Ring-Ellipse; positiv, wenn die nördliche, negativ, wenn die südliche Fläche des Ringes sichtbar ist.

u . . . Länge der Erde vom Saturn aus gesehen, gezählt auf der Ring-Ebene vom aufsteigenden Knoten des Ringes im Aequator an.

u' . . . Dieselbe Länge, gezählt vom aufsteigenden Knoten des Ringes in der Ekliptik an.

Mittl. Zt.	Constellation
Jan.	
d h	
0 20	☉ im Perigaeum
1 19	☿ obere ☌ ☉
2 5	α Virginis ☌ ☾. Bedeckung
2 14	♀ im ☊
5 13	β Scorpii ☌ ☾. Bedeckung
6 4	☿ ☌ ♄, ☿ 2° 11′ südl.
9 6	☿ ☌ ♃, ☿ 1° 50′ südl.
9 11	♄ ☌ ☉
9 11	♄ ☌ ☾
9 21	♃ ☌ ☾
9 21	♂ gr. südl. hel. Breite
9 23	☿ ☌ ☾
10 8	♀ im größten Glanz
11 1	♂ ☌ ☾
12 19	♀ ☌ ☾
13 4	☿ gr. südl. hel. Breite
15 12	♃ ☌ ☉
23 14	☿ ☌ ♂, ☿ 0° 25′ südl.
29 13	α Virginis ☌ ☾. Bedeckung
Febr.	
1 4	☿ im ☊
1 21	β Scorpii ☌ ☾. Bedeckung
3 0	☿ gr. östl. Elong. 18° 17′
3 4	♂ im Perihel
5 3	♀ im Perihel
5 18	☿ im Perihel
6 2	♄ ☌ ☾
6 18	♃ ☌ ☾
8 18	♀ ☌ ☾
9 3	♂ ☌ ☾
9 10	☿ ☌ ☾
14 12	♀ untere ☌ ☉
16 2	☿ gr. nördl. hel. Breite
18 10	☿ untere ☌ ☉

Mittl. Zt.	Constellation
Febr.	
d h	
25 22	α Virginis ☌ ☾. Bedeckung
27 2	♀ gr. nördl. hel. Breite
März	
5 16	♄ ☌ ☾
6 15	♃ ☌ ☾
7 8	♀ ☌ ☾
7 18	☿ ☌ ☾
10 3	♂ ☌ ☾
11 13	☿ im ☋
12 6	♅ □ ☉
17 3	☿ gr. westl. Elong. 27° 40′
19 19	♆ □ ☉
20 4	♀ im größten Glanz
21 2	☉ im ♈, Frühlingsanfang
21 18	☿ im Aphel
25 6	α Virginis ☌ ☾. Bedeckung
29 14	♂ ☌ ☉
April	
2 5	♄ ☌ ☾
3 10	♃ ☌ ☾
4 19	♀ ☌ ☾
6 19	☿ ☌ ☾
8 —	☉ Finsterniß
8 1	♂ ☌ ☾
11 3	☿ gr. südl. hel. Breite
18 0	♄ □ ☉
21 13	α Virginis ☌ ☾. Bedeckung
22 —	☾ Finsterniß
23 13	☿ ☌ ♂, ☿ 0° 40′ südl.
24 3	♀ im ☋
25 13	♀ gr. westl. Elong. 46° 12′
28 13	☿ obere ☌ ☉
29 15	♄ ☌ ☾
30 3	☿ im ☊

Mittl. Zt.	Constellation
Mai	
d h	
1 2	♃ ☌ ☾
4 6	♀ ☌ ☾
4 18	☿ im Perihel
6 22	♃ □ ☉
7 —	☉ Finsternifs
8 5	☿ ☌ ☾
15 1	☿ gr. nördl. hel. Breite
18 19	α Virginis ☌ ☾ . Bedeckung
24 5	♄ im ☋
26 21	♄ ☌ ☾
28 7	☿ gr. östl. Elong. 23° 3′
28 9	♀ im Aphel
28 13	♃ ☌ ☾
29 4	☿ ☌ ♆, ☿ 2° 52′ nördl.
Juni	
2 20	♀ ☌ ☾
4 17	♂ ☌ ☾
6 5	♂ im ☊
7 5	☿ ☌ ☾
7 12	☿ im ☋
10 17	⛢ ☍ ☉
15 0	α Virginis ☌ ☾ . Bedeckung
17 17	☿ im Aphel
20 0	♀ gr. südl. hel. Breite
21 22	☉ im ♋, Sommersanfang
23 0	♄ ☌ ☾
23 4	♆ ☌ ☉
23 9	☿ untere ☌ ☉

Mittl. Zt.	Constellation
Juni	
d h	
23 15	☿ ☌ ♆, ☿ 3° 1′ südl.
24 18	♃ ☌ ☾
Juli	
2 11	♀ ☌ ☾ . Bedeckung
3 11	♂ ☌ ☾
4 2	☉ im Apogaeum
8 2	☿ gr. südl. hel. Breite
15 11	☿ ☌ ♆, ☿ 1° 34′ südl.
15 16	☿ gr. westl. Elong. 20° 35′
17 14	♄ ☍ ☉
20 2	♄ ☌ ☾
21 18	♃ ☌ ☾
23 15	♂ ☌ ♆, ♂ 1° 37′ nördl.
27 3	☿ im ☊
27 8	♀ ☌ ♆, ♀ 0° 11′ nördl.
31 17	☿ im Perihel
31 22	♀ ☌ ♂, ♀ 1° 18′ südl.
Aug.	
1 5	♀ ☌ ☾
1 5	♂ ☌ ☾
2 19	☿ ☌ ☾
5 6	♃ ☍ ☉
11 0	☿ gr. nördl. hel. Breite
11 4	☿ obere ☌ ☉
15 7	♀ im ☊
16 5	♄ ☌ ☾
17 18	♃ ☌ ☾
29 21	♂ ☌ ☾
31 4	♀ ☌ ☾

Mittl. Zt.	Constellation
Sept.	
d h	
3 9	☿ ☌ ☾
3 11	☿ im ☋
10 14	♅ □ ☉
11 10	♀ ☌ α Leonis, ♀ 0° 39′ nördl.
12 11	♄ ☌ ☾
13 17	☿ im Aphel
13 21	♃ ☌ ☾
17 17	♀ im Perihel
20 8	☿ ☌ α Virginis, ☿ 0° 13′ südl.
23 13	☉ in ♎, Herbstanfang
24 17	☿ gr. östl. Elong. 26° 11′
27 7	♆ □ ☉
27 11	♂ ☌ ☾
30 4	♀ ☌ ☾
Oct.	
3 4	☿ ☌ ☾
4 2	☿ gr. südl. hel. Breite
9 19	♀ gr. nördl. hel. Breite
9 20	♄ ☌ ☾
11 5	♃ ☌ ☾
15 8	♄ □ ☉
16 —	☾ Finsternifs
19 8	☿ untere ☌ ☉
20 6	♂ ☌ α Leonis, ♂ 1° 4′ nördl.
23 2	☿ im ☊
23 10	☿ ☌ ♀, ☿ 1° 20′ südl.
25 23	♂ ☌ ☾
27 16	☿ im Perihel
29 12	☿ ☌ ☾
30 —	☉ Finsternifs
Nov.	
d h	
1 15	♃ □ ☉
4 3	☿ gr. westl. Elong. 18° 50′
6 6	♄ ☌ ☾
6 23	☿ gr. nördl. hel. Breite
7 17	♃ ☌ ☾
23 9	♂ ☌ ☾
28 15	♀ obere ☌ ☉
28 22	☿ ☌ ☾
29 14	♀ ☌ ☾
30 10	☿ im ☋
30 22	☿ ☌ β Scorpii, ☿ 1° 6′ südl.
Dec.	
3 18	♄ ☌ ☾
4 20	♀ im ☋
5 8	♃ ☌ ☾
8 7	♂ gr. nördl. hel. Breite
10 16	☿ im Aphel
10 20	♀ ☌ ♅, ♀ 0° 8′ südl.
12 1	☿ obere ☌ ☉
13 7	☿ ☌ ♅, ☿ 1° 13′ südl.
13 23	♅ ☌ ☉
21 15	♂ ☌ ☾
21 21	☿ ☌ ♀, ☿ 1° 16′ südl.
22 7	☉ im ♑, Wintersanfang
24 7	♂ □ ☉
24 14	♆ ☍ ☉
30 5	♀ ☌ ☾
30 12	☿ ☌ ☾
31 1	☿ gr. südl. hel. Breite
31 6	♄ ☌ ☾

Tafel zur Berechnung der Mondlibration.

λ−☊	Δλ	$\frac{1}{a}$	B	Diff.	λ−☊	Δλ	$\frac{1}{a}$	B	Diff.
0°	0.0′	+38	+0° 0.0′	1.6	35°	+0.6′	+46	+0° 52.4′	1.3
1	0.0	38	0 1.6	1.6	36	0.6	47	0 53.7	1.3
2	0.0	38	0 3.2	1.6	37	0.6	47	0 55.0	1.3
3	+0.1	38	0 4.8	1.6	38	0.6	48	0 56.3	1.3
4	0.1	38	0 6.4	1.6	39	0.6	48	0 57.6	1.2
5	+0.1	+38	+0 8.0	1.6	40	+0.6	+49	+0 58.8	1.2
6	0.1	38	0 9.6	1.6	41	0.6	49	1 0.0	1.2
7	0.1	38	0 11.2	1.5	42	0.6	50	1 1.2	1.2
8	0.2	38	0 12.7	1.6	43	0.6	51	1 2.4	1.1
9	0.2	38	0 14.3	1.6	44	0.6	52	1 3.5	1.1
10	+0.2	+38	+0 15.9	1.6	45	+0.6	+53	+1 4.6	1.1
11	0.2	38	0 17.5	1.5	46	0.6	54	1 5.7	1.1
12	0.2	38	0 19.0	1.6	47	0.6	55	1 6.8	1.1
13	0.2	38	0 20.6	1.5	48	0.6	56	1 7.9	1.1
14	0.2	39	0 22.1	1.6	49	0.6	57	1 9.0	1.0
15	+0.3	+39	+0 23.7	1.5	50	+0.6	+58	+1 10.0	1.0
16	0.3	39	0 25.2	1.6	51	0.6	59	1 11.0	1.0
17	0.3	39	0 26.8	1.5	52	0.6	61	1 12.0	1.0
18	0.3	39	0 28.3	1.5	53	0.6	62	1 13.0	0.9
19	0.3	40	0 29.8	1.5	54	0.6	64	1 13.9	1.0
20	+0.4	+40	+0 31.3	1.5	55	+0.6	+65	+1 14.9	0.9
21	0.4	40	0 32.8	1.5	56	0.6	67	1 15.8	0.9
22	0.4	40	0 34.3	1.5	57	0.6	69	1 16.7	0.8
23	0.4	41	0 35.8	1.4	58	0.6	71	1 17.5	0.8
24	0.4	41	0 37.2	1.5	59	0.5	73	1 18.3	0.8
25	+0.5	+41	+0 38.7	1.4	60	+0.5	+75	+1 19.1	0.8
26	0.5	42	0 40.1	1.4	61	0.5	77	1 19.9	0.7
27	0.5	42	0 41.5	1.4	62	0.5	80	1 20.6	0.8
28	0.5	43	0 42.9	1.4	63	0.5	83	1 21.4	0.7
29	0.5	43	0 44.3	1.4	64	0.5	86	1 22.1	0.7
30	+0.5	+43	+0 45.7	1.4	65	+0.5	+89	+1 22.8	0.6
31	0.5	44	0 47.1	1.3	66	0.4	92	1 23.4	0.7
32	0.6	44	0 48.4	1.4	67	0.4	96	1 24.1	0.6
33	0.6	45	0 49.8	1.3	68	0.4	100	1 24.7	0.6
34	0.6	45	0 51.1	1.3	69	0.4	105	1 25.3	0.5
35	+0.6	+46	+0 52.4		70	+0.4	+110	+1 25.8	

Tafel zur Berechnung der Mondlibration.

λ-☋	Δλ	$\frac{1}{a}$	B		λ-☋	Δλ	$\frac{1}{a}$	B	
°	′		° ′		°	′		° ′	
70°	+0.4	+110	+1° 25.8	0.6	80°	+0.2	+ 217	+1° 30.0	0.3
71	0.3	116	1 26.4	0.5	81	0.2	241	1 30.3	0.2
72	0.3	122	1 26.9	0.5	82	0.2	270	1 30.5	0.2
73	0.3	129	1 27.4	0.4	83	0.1	309	1 30.7	0.2
74	0.3	137	1 27.8	0.4	84	0.1	360	1 30.9	0.1
75	+0.3	+146	+1 28.2	0.4	85	+0.1	+ 432	+1 31.0	0.1
76	0.2	156	1 28.6	0.4	86	0.1	539	1 31.1	0.1
77	0.2	167	1 29.0	0.3	87	+0.1	719	1 31.2	0.1
78	0.2	181	1 29.3	0.4	88	0.0	1078	1 31.3	0.1
79	0.2	197	1 29.7	0.3	89	0.0	+2156	1 31.4	0.0
80	+0.2	+217	+1 30.0		90	0.0	∞	+1 31.4	

$J = 1° 31'.37$ = Neigung des Mondaequators gegen die Ekliptik.

☋ = 180° + ☊ = Länge des absteigenden Knotens der Mondbahn auf der Ekliptik (siehe Tafel S. 88).

λ, β = Länge und Breite des Mittelpunktes der Mondscheibe, berechnet für den Beobachtungsort.

$$\Delta\lambda = \operatorname{tg}\frac{J^2}{2}\sin 2(\lambda - ☋)\ 3437'.75;\quad \frac{1}{a} = \frac{1}{\cos(\lambda - ☋)\sin J};$$

$$\operatorname{tg} B = \sin(\lambda - ☋)\operatorname{tg} J.$$

l_0 = Mittlere Länge des Mondes (siehe Tafel S. 88).

l', b' = Optische Libration der Mondmitte in selenocentrischer Länge und Breite.

$$l' = \lambda + \Delta\lambda - \frac{B - \beta}{\frac{1}{a}} - l_0.$$

$$b' = B - \beta.$$

Für λ — ☋ zwischen 90° und 180° gehe man mit dem Argument 180° — (λ — ☋) in die Tafel ein und nehme Δλ und $\frac{1}{a}$ negativ.

Für λ — ☋ zwischen 180° und 270° gehe man mit dem Argument λ — ☋ — 180° in die Tafel ein und nehme $\frac{1}{a}$ und B negativ.

Für λ — ☋ zwischen 270° und 360° gehe man mit dem Argument 360° — (λ — ☋) in die Tafel ein und nehme Δλ und B negativ.

Bruchtheile des Jahres 1902,

für 0^h Mittl. Zeit der mittleren Sonnentage, gezählt vom Beginn des annus fictus.

Monats-tag	Januar		Februar		März		April		Mai		Juni	
	Jahres-tag	Jahres-bruch	Jahres-tag	Jahres-bruch	Jahres-tag	Jahres-bruch	Jahres-tag	Jahres-bruch	Jahres-tag	Jahres-bruch	Jahres-tag	Jahres-bruch
1	0	0.0004	31	0.0853	59	0.1620	90	0.2469	120	0.3290	151	0.4139
2	1	0032	32	0881	60	1647	91	2496	121	3317	152	4166
3	2	0059	33	0908	61	1675	92	2523	122	3345	153	4193
4	3	0087	34	0935	62	1702	93	2551	123	3372	154	4221
5	4	0114	35	0963	63	1729	94	2578	124	3399	155	4248
6	5	0.0141	36	0.0990	64	0.1757	95	0.2605	125	0.3427	156	0.4276
7	6	0169	37	1017	65	1784	96	2633	126	3454	157	4303
8	7	0196	38	1045	66	1811	97	2660	127	3482	158	4330
9	8	0223	39	1072	67	1839	98	2688	128	3509	159	4358
10	9	0251	40	1100	68	1866	99	2715	129	3536	160	4385
11	10	0.0278	41	0.1127	69	0.1894	100	0.2742	130	0.3564	161	0.4412
12	11	0306	42	1154	70	1921	101	2770	131	3591	162	4440
13	12	0333	43	1182	71	1948	102	2797	132	3618	163	4467
14	13	0360	44	1209	72	1976	103	2824	133	3646	164	4495
15	14	0388	45	1236	73	2003	104	2851	134	3673	165	4522
16	15	0.0415	46	0.1264	74	0.2030	105	0.2879	135	0.3701	166	0.4549
17	16	0442	47	1291	75	2058	106	2906	136	3728	167	4577
18	17	0470	48	1319	76	2085	107	2934	137	3755	168	4604
19	18	0497	49	1346	77	2113	108	2961	138	3783	169	4632
20	19	0525	50	1373	78	2140	109	2988	139	3810	170	4659
21	20	0.0552	51	0.1401	79	0.2167	110	0.3016	140	0.3838	171	0.4686
22	21	0579	52	1428	80	2195	111	3043	141	3865	172	4714
23	22	0607	53	1456	81	2222	112	3071	142	3892	173	4741
24	23	0634	54	1483	82	2250	113	3098	143	3920	174	4768
25	24	0662	55	1510	83	2277	114	3125	144	3947	175	4796
26	25	0.0689	56	0.1538	84	0.2304	115	0.3153	145	0.3974	176	0.4823
27	26	0716	57	1565	85	2332	116	3180	146	4002	177	4851
28	27	0744	58	1592	86	2359	117	3208	147	4029	178	4878
29	28	0771	59	1620	87	2386	118	3235	148	4057	179	4905
30	29	0798			88	2414	119	3263	149	4084	180	4933
31	30	0.0826			89	0.2441	120	0.3290	150	0.4111	181	0.4960
32	31	0853			90	2469			151	4139		

Bruchtheile des Jahres 1902,

für 0^h Mittl. Zeit der mittleren Sonnentage, gezählt vom Beginn des annus fictus.

Monatstag	Juli		August		September		October		November		December	
	Jahrestag	Jahresbruch	Jahrestag	Jahresbruch	Jahrestag	Jahresbruch	Jahrestag	Jahresbruch	Jahrestag	Jahresbruch	Jahrestag	Jahresbruch
1	181	0.4960	212	0.5809	243	0.6658	273	0.7479	304	0.8328	334	0.9149
2	182	4987	213	5836	244	6685	274	7506	305	8355	335	9176
3	183	5015	214	5864	245	6712	275	7534	306	8382	336	9204
4	184	5042	215	5891	246	6740	276	7561	307	8410	337	9231
5	185	5070	216	5918	247	6767	277	7588	308	8437	338	9259
6	186	0.5097	217	0.5946	248	0.6794	278	0.7616	309	0.8465	339	0.9286
7	187	5124	218	5973	249	6822	279	7643	310	8492	340	9313
8	188	5152	219	6000	250	6849	280	7671	311	8519	341	9341
9	189	5179	220	6028	251	6877	281	7698	312	8547	342	9368
10	190	5206	221	6055	252	6904	282	7725	313	8574	343	9396
11	191	0.5234	222	0.6083	253	0.6931	283	0.7753	314	0.8602	344	0.9423
12	192	5261	223	6110	254	6959	284	7780	315	8629	345	9450
13	193	5289	224	6137	255	6986	285	7808	316	8656	346	9478
14	194	5316	225	6165	256	7014	286	7835	317	8684	347	9505
15	195	5343	226	6192	257	7041	287	7862	318	8711	348	9532
16	196	0.5371	227	0.6220	258	0.7068	288	0.7890	319	0.8738	349	0.9560
17	197	5398	228	6247	259	7096	289	7917	320	8766	350	9587
18	198	5426	229	6274	260	7123	290	7944	321	8793	351	9615
19	199	5453	230	6302	261	7150	291	7972	322	8821	352	9642
20	200	5480	231	6329	262	7178	292	7999	323	8848	353	9669
21	201	0.5508	232	0.6356	263	0.7205	293	0.8027	324	0.8875	354	0.9697
22	202	5535	233	6384	264	7233	294	8054	325	8903	355	9724
23	203	5562	234	6411	265	7260	295	8081	326	8930	356	9751
24	204	5590	235	6439	266	7287	296	8109	327	8957	357	9779
25	205	5617	236	6466	267	7315	297	8136	328	8985	358	9806
26	206	0.5645	237	0.6493	268	0.7342	298	0.8163	329	0.9012	359	0.9834
27	207	5672	238	6521	269	7369	299	8191	330	9040	360	9861
28	208	5699	239	6548	270	7397	300	8218	331	9067	361	9888
29	209	5727	240	6575	271	7424	301	8246	332	9094	362	9916
30	210	5754	241	6603	272	7452	302	8273	333	9122	363	9943
31	211	0.5781	242	0.6630	273	0.7479	303	0.8300	334	0.9149	364	0.9970
32	212	5809	243	6658			304	8328			365	9998

Julianische Periode.

Anzahl der am Mittag des 1. Januar eines jeden Schaltjahrs seit Anfang der Periode verflossenen Tage.

Jahr n. Chr.	0	100	200	300	400	500	600	700	800	900
	17	17	17	18	18	19	19	19	20	20
0	21058	57583	94108	30633	67158	03683	40208	76733	13258	49783
4	22519	59044	95569	32094	68619	05144	41669	78194	14719	51244
8	23980	60505	97030	33555	70080	06605	43130	79655	16180	52705
12	25441	61966	98491	35016	71541	08066	44591	81116	17641	54166
16	26902	63427	99952	36477	73002	09527	46052	82577	19102	55627
20	28363	64888	01413	37938	74463	10988	47513	84038	20563	57088
24	29824	66349	02874	39399	75924	12449	48974	85499	22024	58549
28	31285	67810	04335	40860	77385	13910	50435	86960	23485	60010
32	32746	69271	05796	42321	78846	15371	51896	88421	24946	61471
36	34207	70732	07257	43782	80307	16832	53357	89882	26407	62932
40	35668	72193	08718	45243	81768	18293	54818	91343	27868	64393
44	37129	73654	10179	46704	83229	19754	56279	92804	29329	65854
48	38590	75115	11640	48165	84690	21215	57740	94265	30790	67315
52	40051	76576	13101	49626	86151	22676	59201	95726	32251	68776
56	41512	78037	14562	51087	87612	24137	60662	97187	33712	70237
60	42973	79498	16023	52548	89073	25598	62123	98648	35173	71698
64	44434	80959	17484	54009	90534	27059	63584	00109	36634	73159
68	45895	82420	18945	55470	91995	28520	65045	01570	38095	74620
72	47356	83881	20406	56931	93456	29981	66506	03031	39556	76081
76	48817	85342	21867	58392	94917	31442	67967	04492	41017	77542
80	50278	86803	23328	59853	96378	32903	69428	05953	42478	79003
84	51739	88264	24789	61314	97839	34364	70889	07414	43939	80464
88	53200	89725	26250	62775	99300	35825	72350	08875	45400	81925
92	54661	91186	27711	64236	00761	37286	73811	10336	46861	83386
96	56122	92647	29172	65697	02222	38747	75272	11797	48322	84847
100	57583	94108	30633	67158	03683	40208	76733	13258	49783	86308
	17	17	18	18	19	19	19	20	20	20

Jahr n. Chr.	Tage
0	1721058
1	1721424
2	1721789
3	1722154
4	1722519

Jahr n. Chr.	Tage
1580	2298153
1581	2298519
1582	2298884
1583	2299239
1584	2299604

Julianische Periode.

Anzahl der am Mittag des 1. Januar eines jeden Schaltjahrs seit Anfang der Periode verflossenen Tage.

Jahr n. Chr.	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900
	20	21	21	21	22	22	23	23	23	24
0	86308	22833	59358	95883	32408	68933	05448	41973*	78497*	15021*
4	87769	24294	60819	97344	33869	70394	06909	43433	79957	16481
8	89230	25755	62280	98805	35330	71855	08370	44894	81418	17942
12	90691	27216	63741	00266	36791	73316	09831	46355	82879	19403
16	92152	28677	65202	01727	38252	74777	11292	47816	84340	20864
20	93613	30138	66663	03188	39713	76238	12753	49277	85801	22325
24	95074	31599	68124	04649	41174	77699	14214	50738	87262	23786
28	96535	33060	69585	06110	42635	79160	15675	52199	88723	25247
32	97996	34521	71046	07571	44096	80621	17136	53660	90184	26708
36	99457	35982	72507	09032	45557	82082	18597	55121	91645	28169
40	00918	37443	73968	10493	47018	83543	20058	56582	93106	29630
44	02379	38904	75429	11954	48479	85004	21519	58043	94567	31091
48	03840	40365	76890	13415	49940	86465	22980	59504	96028	32552
52	05301	41826	78351	14876	51401	87926	24441	60965	97489	34013
56	06762	43287	79812	16337	52862	89387	25902	62426	98950	35474
60	08223	44748	81273	17798	54323	90848	27363	63887	00411	36935
64	09684	46209	82734	19259	55784	92309	28824	65348	01872	38396
68	11145	47670	84195	20720	57245	93770	30285	66809	03333	39857
72	12606	49131	85656	22181	58706	95231	31746	68270	04794	41318
76	14067	50592	87117	23642	60167	96692	33207	69731	06255	42779
80	15528	52053	88578	25103	61628	98153	34668	71192	07716	44240
84	16989	53514	90039	26564	63089	99604	36129	72653	09177	45701
88	18450	54975	91500	28025	64550	01065	37590	74114	10638	47162
92	19911	56436	92961	29486	66011	02526	39051	75575	12099	48623
96	21372	57897	94422	30947	67472	03987	40512	77036	13560	50084
100	22833	59358	95883	32408	68933	05448	41973*	78497*	15021*	51545
	21	21	21	22	22	23	23	23	24	24

Anm. Die mit * bezeichneten Jahre sind Gemeinjahre.

Jahr n. Chr.	Tage	Jahr n. Chr.	Tage	Jahr n. Chr.	Tage
1700	2341973	1800	2378497	1900	2415021
1701	2342338	1801	2378862	1901	2415386
1702	2342703	1802	2379227	1902	2415751
1703	2343068	1803	2379592	1903	2416116
1704	2343433	1804	2379957	1904	2416481

Zur Verwandlung der Mittl. Zeit in Sternzeit.

Tafel I.

Red. auf St.-Zt.	Mittl. Zt.
m s	h m s
+0 0	0 0 0
0 10	1 0 52
0 20	2 1 45
0 30	3 2 37
0 40	4 3 30
0 50	5 4 22
+1 0	6 5 15
1 10	7 6 7
1 20	8 6 59
1 30	9 7 52
1 40	10 8 44
1 50	11 9 37
+2 0	12 10 29
2 10	13 11 21
2 20	14 12 14
2 30	15 13 6
2 40	16 13 59
2 50	17 14 51
+3 0	18 15 44
3 10	19 16 36
3 20	20 17 28
3 30	21 18 21
3 40	22 19 13
3 50	23 20 6
4 0	24 20 58

Tafel II.

Red. auf St.-Zt.	Mittl. Zt.	Red. auf St.-Zt.	Mittl. Zt.	Red. auf St.-Zt.	Mittl. Zt.
s	m s	s	m s	s	m s
+0.0	0 0	+4.0	24 21	+8.0	48 42
0.1	0 37	4.1	24 58	8.1	49 19
0.2	1 13	4.2	25 34	8.2	49 55
0.3	1 50	4.3	26 11	8.3	50 32
0.4	2 26	4.4	26 47	8.4	51 8
0.5	3 3	4.5	27 24	8.5	51 45
0.6	3 39	4.6	28 0	8.6	52 21
0.7	4 16	4.7	28 37	8.7	52 58
0.8	4 52	4.8	29 13	8.8	53 34
0.9	5 29	4.9	29 50	8.9	54 11
+1.0	6 5	+5.0	30 26	+9.0	54 47
1.1	6 42	5.1	31 3	9.1	55 24
1.2	7 18	5.2	31 39	9.2	56 0
1.3	7 55	5.3	32 16	9.3	56 37
1.4	8 31	5.4	32 52	9.4	57 13
1.5	9 8	5.5	33 29	9.5	57 50
1.6	9 44	5.6	34 5	9.6	58 26
1.7	10 21	5.7	34 42	9.7	59 3
1.8	10 57	5.8	35 18	9.8	59 39
1.9	11 34	5.9	35 55	9.9	60 16
+2.0	12 10	+6.0	36 31		
2.1	12 47	6.1	37 8		
2.2	13 23	6.2	37 44		
2.3	14 0	6.3	38 21		
2.4	14 36	6.4	38 57		
2.5	15 13	6.5	39 34		
2.6	15 49	6.6	40 10		
2.7	16 26	6.7	40 47		
2.8	17 2	6.8	41 23		
2.9	17 39	6.9	42 0		
+3.0	18 16	+7.0	42 37		
3.1	18 53	7.1	43 14		
3.2	19 29	7.2	43 50		
3.3	20 6	7.3	44 27		
3.4	20 42	7.4	45 3		
3.5	21 19	7.5	45 40		
3.6	21 55	7.6	46 16		
3.7	22 32	7.7	46 53		
3.8	23 8	7.8	47 29		
3.9	23 45	7.9	48 6		

Tafel III.

s	m s
+0.01	0 4
0.02	0 7
0.03	0 11
0.04	0 15
0.05	0 18
0.06	0 22
0.07	0 26
0.08	0 29
0.09	0 33
0.10	0 37

Zur Verwandlung der Sternzeit in Mittl. Zeit.

Tafel I.

Red. auf Mittl. Zt. m s	Stern-Zt. h m s
— 0 0	0 0 0
0 10	1 1 2
0 20	2 2 5
0 30	3 3 7
0 40	4 4 10
0 50	5 5 12
— 1 0	6 6 15
1 10	7 7 17
1 20	8 8 19
1 30	9 9 22
1 40	10 10 24
1 50	11 11 27
— 2 0	12 12 29
2 10	13 13 31
2 20	14 14 34
2 30	15 15 36
2 40	16 16 39
2 50	17 17 41
— 3 0	18 18 44
3 10	19 19 46
3 20	20 20 48
3 30	21 21 51
3 40	22 22 53
3 50	23 23 56
4 0	24 24 58

Tafel II.

Red. auf Mittl. Zt. s	Stern-Zt. m s	Red. auf Mittl. Zt. s	Stern-Zt. m s	Red. auf Mittl. Zt. s	Stern-Zt. m s
— 0.0	0 0	— 4.0	24 25	— 8.0	48 50
0.1	0 37	4.1	25 2	8.1	49 27
0.2	1 13	4.2	25 38	8.2	50 3
0.3	1 50	4.3	26 15	8.3	50 40
0.4	2 26	4.4	26 51	8.4	51 16
0.5	3 3	4.5	27 28	8.5	51 53
0.6	3 40	4.6	28 5	8.6	52 30
0.7	4 16	4.7	28 41	8.7	53 6
0.8	4 53	4.8	29 18	8.8	53 43
0.9	5 30	4.9	29 55	8.9	54 20
— 1.0	6 6	— 5.0	30 31	— 9.0	54 56
1.1	6 43	5.1	31 8	9.1	55 33
1.2	7 19	5.2	31 44	9.2	56 9
1.3	7 56	5.3	32 21	9.3	56 46
1.4	8 32	5.4	32 57	9.4	57 22
1.5	9 9	5.5	33 34	9.5	57 59
1.6	9 46	5.6	34 11	9.6	58 36
1.7	10 22	5.7	34 47	9.7	59 12
1.8	10 59	5.8	35 24	9.8	59 49
1.9	11 36	5.9	36 1	9.9	60 26
— 2.0	12 12	— 6.0	36 37		
2.1	12 49	6.1	37 14		
2.2	13 25	6.2	37 50		
2.3	14 2	6.3	38 27		
2.4	14 38	6.4	39 3		
2.5	15 15	6.5	39 40		
2.6	15 52	6.6	40 17		
2.7	16 28	6.7	40 53		
2.8	17 5	6.8	41 30		
2.9	17 42	6.9	42 7		
— 3.0	18 19	— 7.0	42 44		
3.1	18 56	7.1	43 21		
3.2	19 32	7.2	43 57		
3.3	20 9	7.3	44 34		
3.4	20 45	7.4	45 10		
3.5	21 22	7.5	45 47		
3.6	21 59	7.6	46 24		
3.7	22 35	7.7	47 0		
3.8	23 12	7.8	47 37		
3.9	23 49	7.9	48 14		

Tafel III.

s	m s
— 0.01	0 4
0.02	0 7
0.03	0 11
0.04	0 15
0.05	0 18
0.06	0 22
0.07	0 26
0.08	0 29
0.09	0 33
0.10	0 37

Zur Verwandlung von Stunden, Minuten und Secunden in Decimaltheile des Tages und umgekehrt.

Tag	h m s	Tag	h m s	Tag	h m s
0.01	0 14 24	0.36	8 38 24	0.71	17 2 24
0.02	0 28 48	0.37	8 52 48	0.72	17 16 48
0.03	0 43 12	0.38	9 7 12	0.73	17 31 12
0.04	0 57 36	0.39	9 21 36	0.74	17 45 36
0.05	1 12 0	0.40	9 36 0	0.75	18 0 0
0.06	1 26 24	0.41	9 50 24	0.76	18 14 24
0.07	1 40 48	0.42	10 4 48	0.77	18 28 48
0.08	1 55 12	0.43	10 19 12	0.78	18 43 12
0.09	2 9 36	0.44	10 33 36	0.79	18 57 36
0.10	2 24 0	0.45	10 48 0	0.80	19 12 0
0.11	2 38 24	0.46	11 2 24	0.81	19 26 24
0.12	2 52 48	0.47	11 16 48	0.82	19 40 48
0.13	3 7 12	0.48	11 31 12	0.83	19 55 12
0.14	3 21 36	0.49	11 45 36	0.84	20 9 36
0.15	3 36 0	0.50	12 0 0	0.85	20 24 0
0.16	3 50 24	0.51	12 14 24	0.86	20 38 24
0.17	4 4 48	0.52	12 28 48	0.87	20 52 48
0.18	4 19 12	0.53	12 43 12	0.88	21 7 12
0.19	4 33 36	0.54	12 57 36	0.89	21 21 36
0.20	4 48 0	0.55	13 12 0	0.90	21 36 0
0.21	5 2 24	0.56	13 26 24	0.91	21 50 24
0.22	5 16 48	0.57	13 40 48	0.92	22 4 48
0.23	5 31 12	0.58	13 55 12	0.93	22 19 12
0.24	5 45 36	0.59	14 9 36	0.94	22 33 36
0.25	6 0 0	0.60	14 24 0	0.95	22 48 0
0.26	6 14 24	0.61	14 38 24	0.96	23 2 24
0.27	6 28 48	0.62	14 52 48	0.97	23 16 48
0.28	6 43 12	0.63	15 7 12	0.98	23 31 12
0.29	6 57 36	0.64	15 21 36	0.99	23 45 36
0.30	7 12 0	0.65	15 36 0	1.00	24 0 0
0.31	7 26 24	0.66	15 50 24		
0.32	7 40 48	0.67	16 4 48		
0.33	7 55 12	0.68	16 19 12		
0.34	8 9 36	0.69	16 33 36		
0.35	8 24 0	0.70	16 48 0		

Zur Verwandlung von Stunden, Minuten und Secunden in Decimaltheile des Tages und umgekehrt.

Tag	m s	Tag	m s	Tag	m s	Tag	s
0.0001	0 8.64	0.0036	5 11.04	0.0071	10 13.44	0.00001	0.864
02	0 17.28	37	5 19.68	72	10 22.08	2	1.728
03	0 25.92	38	5 28.32	73	10 30.72	3	2.592
04	0 34.56	39	5 36.96	74	10 39.36	4	3.456
05	0 43.20	40	5 45.60	75	10 48.00	5	4.320
06	0 51.84	41	5 54.24	76	10 56.64	6	5.184
07	1 0.48	42	6 2.88	77	11 5.28	7	6.048
08	1 9.12	43	6 11.52	78	11 13.92	8	6.912
09	1 17.76	44	6 20.16	79	11 22.56	9	7.776
10	1 26.40	45	6 28.80	80	11 31.20	10	8.640
11	1 35.04	46	6 37.44	81	11 39.84		
12	1 43.68	47	6 46.08	82	11 48.48		
13	1 52.32	48	6 54.72	83	11 57.12		
14	2 0.96	49	7 3.36	84	12 5.76		
15	2 9.60	50	7 12.00	85	12 14.40		
16	2 18.24	51	7 20.64	86	12 23.04	0.000001	0.086
17	2 26.88	52	7 29.28	87	12 31.68	2	0.173
18	2 35.52	53	7 37.92	88	12 40.32	3	0.259
19	2 44.16	54	7 46.56	89	12 48.96	4	0.346
20	2 52.80	55	7 55.20	90	12 57.60	5	0.432
21	3 1.44	56	8 3.84	91	13 6.24	6	0.518
22	3 10.08	57	8 12.48	92	13 14.88	7	0.605
23	3 18.72	58	8 21.12	93	13 23.52	8	0.691
24	3 27.36	59	8 29.76	94	13 32.16	9	0.778
25	3 36.00	60	8 38.40	95	13 40.80	10	0.864
26	3 44.64	61	8 47.04	96	13 49.44		
27	3 53.28	62	8 55.68	97	13 58.08		
28	4 1.92	63	9 4.32	98	14 6.72		
29	4 10.56	64	9 12.96	99	14 15.36		
30	4 19.20	65	9 21.60	100	14 24.00		
31	4 27.84	66	9 30.24				
32	4 36.48	67	9 38.88				
33	4 45.12	68	9 47.52				
34	4 53.76	69	9 56.16				
35	5 2.40	70	10 4.80				

Hülfsgröſsen
zur Berechnung der Praecession nach Newcomb
von den Katalogepochen t_0 bis 1902.0.

$t = 1902.0.$

t_0	$m^s(t-t_0)$	$\log[n^s(t-t_0)]$	$\log[n''(t-t_0)]$
1790	+5ᵐ 43.989ˢ	2.175274	3.351365
1800	5 13.286	2.134646	3.310737
1810	4 42.580	2.089825	3.265916
1825	3 56.518	2.012514	3.188605
1830	3 41.162	1.983351	3.159442
1835	+3 25.807	1.952089	3.128180
1836	3 22.736	1.945557	3.121648
1840	3 10.452	1.918401	3.094492
1842	3 4.309	1.904158	3.080249
1845	2 55.095	1.881879	3.057970
1850	+2 39.738	1.842003	3.018094
1855	2 24.381	1.79809	2.97418
1860	2 9.024	1.74924	2.92533
1864	1 56.737	1.70577	2.88186
1865	1 53.665	1.69419	2.87028
1870	+1 38.307	1.63113	2.80722
1872	1 32.163	1.60310	2.77919
1875	1 22.947	1.55734	2.73343
1880	1 7.558	1.46840	2.64449
1885	0 52.228	1.35642	2.53251
1890	+0 36.867	1.20514	2.38123
1895	0 21.506	0.97106	2.14715
1900	+0 6.144	0.42698	1.60307
1910	−0 24.580	1.02903_n	2.20512_n

m und *n* sind die Newcomb'schen Constanten für die Epoche $\frac{1}{2}(t+t_0)$.

Ist α', δ' der genäherte Sternort für die Zeit $\frac{1}{2}(t+t_0)$,

so ist
$$\alpha = \alpha_0 + [m^s(t-t_0)] + [n^s(t-t_0)] \sin\alpha' \operatorname{tg}\delta'$$
$$\delta = \delta_0 + [n''(t-t_0)] \cos\alpha'.$$

Name	Seehöhe	Geogr. Breite	Länge von Berlin + westlich	Corr. der Sternzeit	Geoc. Breite	Log. ρ
	m	° ′ ″	h m s	s	° ′ ″	
Altenburg [1]) . .	229	+50 58 20	+0 3 50.64	+ 0.63	+50 47 4	9.999141
Åbo	—	+60 26 56.8	−0 35 31.50	− 5.84	+60 17 3.1	9.998902
Adelaide	43	−34 55 33.8	−8 20 45.51	−82.26	−34 44 46.2	9.999530
Albany (N. Stw.) [2])	40	+42 39 12.6	+5 48 41.23	+57.28	+42 27 44.5	9.999339
Alfred Centre N.Y.	556	+42 15 19.8	+6 4 42.00	+59.91	+42 3 52.5	9.999384
Algier (N. Stw.) [3]) .	20	+36 47 50	+0 41 26.3	+ 6.81	+36 36 48	9.999483
Allegheny Pa. . .	349	+40 27 41.6	+6 13 37.84	+61.38	+40 16 20.0	9.999415
Altona	—	+53 32 45.3	+0 13 48.56	+ 2.27	+53 21 44.5	9.999063
Amherst Mass. . .	122	+42 22 17.1	+5 43 39.58	+56.46	+42 10 49.6	9.999351
Annapolis Md. .	—	+38 58 53.5	+5 59 31.40	+59.06	+38 47 38.5	9.999428
Ann Arbor Mich.	285	+42 16 48.0	+6 28 30.10	+63.82	+42 5 20.7	9.999364
Arcetri [4])	186	+43 45 14.4	+0 8 31.8	+ 1.40	+43 33 44.5	9.999321
Arequipa	2400	−16 24 0	+5 39 5	+55.70	−16 17 47	0.000049
Armagh	61	+54 21 12.7	+1 20 10.3	+13.17	+54 10 17.8	9.999047
Athen	—	+37 58 20.7	−0 41 20	− 6.79	+37 47 11.3	9.999453
Bamberg [5]) . . .	299	+49 53 6.0	+0 10 1.23	+ 1.65	+49 41 45.0	9.999174
Beloit Wisc. . .	—	+42 30 9	+6 49 42.3	+67.31	+42 18 41	9.999340
Bergen	—	+60 23 54	+0 32 22.1	+ 5.32	+60 14 0	9.998903
Berkeley Calif. . .	—	+37 52 23.6	+9 2 37.63	+89.14	+37 41 14.7	9.999455
Berlin [6])	47	+52 30 16.7	0 0 0.00	0.00	+52 19 9.0	9.999091
Berlin (Urania) . .	—	+52 31 30.7	+0 0 7.40	+ 0.02	+52 20 23.2	9.999088
Bern	573	+46 57 8.7	+0 23 49.25	+ 3.91	+46 45 39.5	9.999266
Besançon	312	+47 14 59.0	+0 29 37.7	+ 4.87	+47 3 30.3	9.999241
Bethlehem Pa. [7]) .	—	+40 36 23.5	+5 55 6.81	+58.34	+40 25 1.3	9.999388
Birr Castle [8]) . .	—	+53 5 47	+1 25 15.8	+14.00	+52 54 43	9.999073
Bogota	2700	+ 4 35 48	+5 50 34	+57.59	+ 4 33 58	0.000175
Bologna	—	+44 29 47	+0 8 10.0	+ 1.34	+44 18 16	9.999289
Bombay	—	+18 54 0	−3 57 40.79	−39.05	+18 46 58	9.999849
Bonn	62	+50 43 45.0	+0 25 11.62	+ 4.14	+50 32 27.7	9.999136
Bordeaux	73	+44 50 7.2	+0 55 40.32	+ 9.14	+44 38 36.6	9.999286
Bothkamp [9]) . . .	32	+54 12 9.6	+0 13 3.7	+ 2.15	+54 1 13.6	9.999048
Bremen [10]) . . .	—	+53 4 36	+0 18 20	+ 3.01	+52 53 32	9.999074
Breslau	147	+51 6 56.5	−0 14 33.93	− 2.39	+50 55 41.1	9.999132

1) Fr. Krüger.
2) Dudley Observatory, seit Juni 1893. Alte Sternwarte 37″.0 nördlich, 7ˢ.10 östlich.
3) Alte Sternwarte 3′.8 südlich, 8ˢ östlich.
4) Seit October 1872, früher in Florenz.
5) Remeis' Sternwarte.
6) Seit 1835. Alte Sternwarte 56″.4 nördlich, 0ˢ.39 westlich.
7) Sayre Observatory, auch South-Bethlehem.
8) Earl of Rosse.
9) Herr von Bülow.
10) Olbers.

Name	Seehöhe	Geogr. Breite	Länge von Berlin + westlich	Corr. der Sternzeit	Geoc. Breite	Log. ρ
	m	° ′ ″	h m s	s	° ′ ″	
Brisbane	—	−27 28 0	−9 18 31.5	−91.75	−27 18 36	9.999693
Brüssel (Alte Stw.) . .	56	+50 51 10.7	+0 36 6.2	+ 5.93	+50 39 54.0	9.999133
Brüssel (Neue Stw.)[1] .	102	+50 47 53	+0 36 8.1	+ 5.94	+50 36 36	9.999137
Budapest[2])	—	+47 29 34.7	−0 22 40.5	− 3.73	+47 18 6.5	9.999213
Cambridge Engl. . .	28	+52 12 51.6	+0 53 12.16	+ 8.74	+52 1 42.2	9.999097
Cambridge Mass.[3]) .	24	+42 22 47.6	+5 38 5.89	+55.54	+42 11 20.1	9.999345
Catania	60	+37 30 13.3	−0 6 45.8	− 1.11	+37 19 6.7	9.999468
Chapultepec[4]) . .	—	+19 25 17.5	+7 30 13.15	+73.96	+19 18 5.5	9.999841
Charkow	—	+50 0 10.2	−1 31 19.8	−15.01	+49 48 49.7	9.999150
Charlottesville Virg.[5])	—	+38 2 1.2	+6 7 40.13	+60.40	+37 50 51.4	9.999451
Chicago Ill. (Alte Stw.)[6])	—	+41 50 1.0	+6 44 1.69	+66.37	+41 38 34.8	9.999357
Chicago Ill. (Neue Stw.)	—	+42 3	+6 44 17	+66.41	+41 52	9.999351
Christiania	25	+59 54 43.7	+0 10 41.27	+ 1.76	+59 44 43.5	9.998916
Cincinnati Ohio (A. Stw.)	—	+39 6 26.5	+6 31 33.96	+64.32	+38 55 10.9	9.999425
Cincinnati (N. Stw.)[7])	263	+39 8 19.5	+6 31 16.20	+64.27	+38 57 3.7	9.999442
Clinton N. Y.[8]) . . .	276	+43 3 16.5	+5 55 12.35	+58.35	+42 51 47.6	9.999345
Coimbra	99	+40 12 25.8	+1 27 9.0	+14.32	+40 1 5.2	9.999405
Columbia Missouri[9])	225	+38 56 51.7	+7 2 53.24	+69.47	+38 45 36.9	9.999444
Cordoba	439	−31 25 15.5	+5 10 23.1	+50.99	−31 15 2.0	9.999638
Danzig	3	+54 21 18.0	−0 21 4.7	− 3.46	+54 10 23.1	9.999043
Denver Col.[10]) . .	1650	+39 40 36.4	+7 53 22.54	+77.76	+39 29 18.1	9.999523
Dorpat	73	+58 22 47.1	−0 53 18.6	− 8.76	+58 12 29.5	9.998953
Dresden (Neue Stw.)[11])	121	+51 2 16.8	−0 1 19.94	− 0.22	+50 51 1.0	9.999132
Dublin[12])	86	+53 23 13.1	+1 18 56.0	+12.97	+53 12 11.2	9.999072
Düsseldorf (Bilk) . .	26	+51 12 25.0	+0 26 29.9	+ 4.35	+51 1 10.0	9.999122
Dunecht[13])	141	+57 9 36	+1 3 15	+10.39	+56 59 6	9.998986
Durham	—	+54 46 6.2	+0 59 54.6	+ 9.84	+54 35 14.6	9.999033
Edinburg	106	+55 57 23.2	+1 6 17.96	+10.89	+55 46 41.7	9.999012
Edinburg (Blackf. Hill)	134	+55 55 28.0	+1 6 18.9	+10.89	+55 44 46.2	9.999014
Florenz[14])	73	+43 46 4.1	+0 8 33.0	+ 1.40	+43 34 34.2	9.999313
Genf	407	+46 11 58.8	+0 28 58.15	+ 4.76	+46 0 28.7	9.999274
Genua (Mar. Stw.) . .	—	+44 25 9.3	+0 17 53.5	+ 2.94	+44 13 38.8	9.999291
Georgetown D. C. .	46	+38 54 26.2	+6 1 53.20	+59.45	+38 43 11.6	9.999433

1) Uccle. 2) Geod. Observ. des Polytechnikums. 3) Harvard College Observatory.
4) Alte Sternwarte, 1883 nach Tacubaya verlegt.
5) Leander Mc. Cormick Obs. der University of Virginia.
6) Dearborn Observatory, 1887 geschlossen. 7) Mount Lookout, seit 1873.
8) Litchfield Observatory. 9) Laws Observatory. 10) University Park, Chamberlin Observatory.
11) v. Engelhardt; Herbst 1897 aufgelöst. Alte Sternwarte 14″.2 nördlich, $1^{s}.57$ westlich.
12) Dunsink Observatory. 13) Earl of Crawford. 14) 1872 nach Arcetri verlegt.

Name	Seehöhe	Geogr. Breite	Länge von Berlin + westlich	Corr. der Sternzeit	Geoc. Breite	Log. ρ
	m	° ′ ″	h m s	s	° ′ ″	
Glasgow Schottl. . . .	—	+55 52 42.6	+1 10 45.46	+11.62	+55 42 0.4	9.999007
Glasgow Missouri . . .	228	+39 13 45.6	+7 4 52.93	+69.80	+39 2 29.4	9.999438
Göttingen	161	+51 31 47.9	+0 13 48.5	+ 2.27	+51 20 34.6	9.999123
Gohlis[1])	108	+51 21 35.0	+0 4 5.26	+ 0.67	+51 10 20.8	9.999123
Gotha (Neue Stw.)[2]) . .	320	+50 56 37.5	+0 10 44.35	+ 1.76	+50 45 21.2	9.999149
Graz	375	+47 4 37.2	—0 8 13	— 1.35	+46 53 8.2	9.999250
Greenwich	47	+51 28 38.1	+0 53 34.91	+ 8.80	+51 17 24.5	9.999116
Grignon	—	+47 33 42	+0 35 57	+ 5.91	+47 22 14	9.999212
Hamburg	25	+53 33 7.0	+0 13 41.1	+ 2.25	+53 22 6.2	9.999064
Hanover N. H.	—	+43 42 15.2	+5 42 42.87	+56.30	+43 30 45.4	9.999310
Harrow[3])	66	+51 34 47.4	+0 55 54.8	+ 9.19	+51 23 33.5	9.999115
Hastings on Huds. N.Y.[4])	—	+40 59 25	+5 49 4.6	+57.35	+40 48 1	9.999378
Haverford	—	+40 0 36.5	+5 54 47.66	+58.28	+39 49 16.7	9.999403
Heidelberg[5])	—	+49 24 35	+0 18 46.4	+ 3.08	+49 13 12	9.999165
Heidelberg (Königstuhl)	570	+49 23 54.9	+0 18 40.86	+ 3.07	+49 12 32.0	9.999204
St. Helena	210	—15 55 26	+1 16 27.1	+12.56	—15 49 23	9.999906
Helsingfors	38	+60 9 42.6	—0 46 14.23	— 7.60	+59 59 45.4	9.998912
Hereny Ungarn[6]) . . .	229	+47 15 47.4	—0 12 49.8	— 2.11	+47 4 18.7	9.999235
Hongkong	—	+22 18 12.2	—6 43 7.0	—66.22	+22 10 8.4	9.999792
Hudson Ohio	—	+41 14 42.6	+6 19 19.06	+62.31	+41 3 18.2	9.999372
Ipswich (Orwell Park)[7]) .	—	+52 0 33	+0 48 39.1	+ 7.99	+51 49 22	9.999100
Jena (Univers.)	156	+50 55 35.6	+0 7 14.1	+ 1.19	+50 44 19.2	9.999137
Jena[8])	174	+50 56 15.7	+0 7 12.89	+ 1.19	+50 44 59.4	9.999139
Kairo	—	+30 4 38.2	—1 11 34.00	—11.76	+29 54 40.2	9.999638
Kalocsa[9])	110	+46 31 42	—0 22 19.4	— 3.67	+46 20 12	9.999245
Kapstadt	16	—33 56 3.2	—0 20 19.83	— 3.34	—33 45 24.3	9.999551
Karlsruhe[10])	110	+49 0 29.6	+0 19 58.4	+ 3.28	+48 49 5.4	9.999183
Kazan	70	+55 47 24.2	—2 22 54.16	—23.48	+55 36 41.2	9.999014
Kew	10	+51 28 6	+0 54 50.0	+ 9.01	+51 16 52	9.999115
Kiel	47	+54 20 28.5	+0 12 59.22	+ 2.13	+54 9 33.5	9.999047
Kiew	179	+50 27 12.5	—1 8 25.80	—11.24	+50 15 53.9	9.999151
Kis Kartal[11])	—	+47 41 54.8	—0 24 36.8	— 4.04	+47 30 27.0	9.999208
Königsberg	22	+54 42 50.6	—0 28 24.20	— 4.67	+54 31 58.6	9.999036

1) Hr. Winkler, August 1887 nach Jena verlegt.
2) Seit 1853, früher Seeberg.
3) Col. Tupman.
4) Dr. Draper.
5) Prof. Max Wolf.
6) Herren Eug. und Alex. von Gothard.
7) Col. Tomline.
8) Hr. Winkler.
9) Erzbischöfl. Haynald'sche Sternwarte.
10) 1896 nach Heidelberg verlegt.
11) Baron von Podmaniczky.

Name	Seehöhe	Geogr. Breite	Länge von Berlin + westlich	Corr. der Sternzeit	Geoc. Breite	Log. ρ
	m	° ′ ″	h m s	s	° ′ ″	
Kopenhagen (N.Stw.) [1])	14	+55 41 12.9	+0 3 15.99	+ 0.54	+55 30 29.0	9.999012
Krakau	221	+50 3 51.9	—0 26 15.47	— 4.31	+49 52 31.6	9.999164
Kremsmünster . .	384	+48 3 23.1	—0 2 56.73	— 0.48	+47 51 56.1	9.999225
La Plata	—	—34 54 30	+4 45 11.9	+46.85	—34 43 43	9.999527
Leiden (Neue Stw.)[2]) .	6	+52 9 20.2	+0 35 38.56	+ 5.86	+51 58 10.4	9.999097
Leipzig (Neue Stw.)[3]) .	119	+51 20 5.9	+0 4 0.89	+ 0.66	+51 8 52.0	9.999125
Lemberg	338	+49 50 11	—0 42 29	— 6.98	+49 38 50	9.999177
Leyton [4])	—	+51 34 34.0	+0 53 35.8	+ 8.80	+51 23 21.0	9.999111
Lissabon (Neue Stw.) .	94	+38 42 31.3	+1 30 19.58	+14.84	+38 31 17.7	9.999441
Lissabon (Mar. Stw.) .	—	+38 42 17.6	+1 30 8.4	+14.81	+38 31 4.0	9.999435
Liverpool (Neue Stw.)[5])	61	+53 24 3.8	+1 5 52.1	+10.82	+53 13 2.0	9.999070
London[6])	—	+51 31 30	+0 54 12.0	+ 8.90	+51 20 17	9.999112
Lübeck	—	+53 51 31.1	+0 10 49.2	+ 1.78	+53 40 32.5	9.999055
Lund	34	+55 41 52.0	+0 0 49.89	+ 0.14	+55 31 8.3	9.999013
Lussinpiccolo [7]) . .	—	+44 32 11	—0 4 17.5	— 0.70	+44 20 40	9.999288
Lüttich Ougrée . .	128	+50 37 6	+0 31 23	+ 5.15	+50 25 48	9.999144
Lyon	299	+45 41 40.8	+0 34 26.8	+ 5.66	+45 30 10.3	9.999279
Madison Wisc.[8]) .	293	+43 4 36.7	+6 51 12.80	+67.55	+42 53 7.8	9.999345
Madras	7	+13 4 8.1	—4 27 24.42	—43.93	+12 59 4.8	9.999926
Madrid	655	+40 24 29.7	+1 8 19.92	+11.23	+40 13 8.3	9.999437
Mailand	120	+45 27 59.4	+0 16 48.94	+ 2.76	+45 16 30.1	9.999273
Manila	—	+14 35 25	—7 10 15	—70.68	+14 29 49	9.999909
Mannheim	98	+49 29 11.0	+0 19 44.39	+ 3.24	+49 17 48.5	9.999170
Marburg	248	+50 48 46.9	+0 18 29.9	+ 3.04	+50 37 30.0	9.999147
Mare Island Calif. .	18	+38 5 55.8	+9 2 40.2	+89.15	+37 54 45.6	9.999451
Markree [9])	45	+54 10 31.7	+1 27 23.3	+14.36	+53 59 35.5	9.999050
Marseille (N. Stw.) [10])	75	+43 18 19.1	+0 32 0.27	+ 5.26	+43 6 49.8	9.999325
Melbourne	28	—37 49 53.1	—8 46 19.26	—86.46	—37 38 44.5	9.999458
Meudon	—	+48 48 18	+0 44 39.3	+ 7.34	+48 36 53	9.999180
Mexico	2277	+19 26 1.3	+7 30 1.58	+73.93	+19 18 49.0	9.999995
Middletown Conn. .	—	+41 33 16.0	+5 44 12.1	+56.54	+41 21 50.6	9.999364
Modena	63	+44 38 52.8	+0 9 52.0	+ 1.62	+44 27 22.2	9.999289
Moncalieri	—	+44 59 51	+0 22 46	+ 3.74	+44 48 20	9.999277

[1]) Alte Sternwarte 20″.3 südlich, 0ˢ.03 westlich.
[2]) Seit 1860. Alte Sternwarte 8″.0 nördlich, 0ˢ.42 östlich.
[3]) Seit 1861. Alte Sternwarte 14″.2 nördlich, 4ˢ.00 westlich. [4]) J. Gurney Barclay.
[5]) Alte Sternwarte 44″.0 nördlich, 17ˢ.1 östlich. [6]) Regents Park, G. Bishop 1836—61.
[7]) Manora-Sternwarte. [8]) Washburn Observatory.
[9]) Col. Cooper. [10]) Seit 1866. Alte Sternwarte 30″.1 südlich, 6ˢ.2 westlich; 29ᵐ.

Name	Seehöhe	Geogr. Breite	Länge von Berlin + westlich	Corr. der Sternzeit	Geoc. Breite	Log. ρ
	m	° ′ ″	h m s	s	° ′ ″	
Montreal Canada . .	20	+45 30 17.0	+5 47 53.45	+57.15	+45 18 46.4	9.999265
Mt. Hamilton Calif.[1]	1283	+37 20 25.6	+9 0 9.72	+88.74	+37 9 20.1	9.999556
Moskau	142	+55 45 19.8	−1 36 42.26	−15.89	+55 34 36.5	9.999019
München	529	+48 8 45.5	+0 7 8.79	+ 1.17	+47 57 18.8	9.999233
Nashville Tenn.[2] .	—	+36 8 58.2	+6 40 47.68	+65.84	+35 58 0.9	9.999497
Natal	—	−29 50 47.0	−1 10 26.3	−11.57	−29 40 51.7	9.999643
Neapel (Capo di M.) .	164	+40 51 45.4	−0 3 26.8	− 0.57	+40 40 22.3	9.999392
Neuchâtel	488	+46 59 50.6	+0 25 45.05	+ 4.23	+46 48 21.5	9.999259
New Haven Conn.[3]	—	+41 19 24.0	+5 45 15.40	+56.72	+41 7 59.3	9.999369
New York N. Y.[4] .	—	+40 43 48.5	+5 49 31.53	+57.42	+40 32 25.8	9.999384
New York (Columb C.)	—	+40 45 23.1	+5 49 28.60	+57.41	+40 34 0.3	9.999384
Nicolajew	55	+46 58 20.6	−1 14 18.96	−12.21	+46 46 51.4	9.999230
Nizza (Mont Gros)[5] .	378	+43 43 16.9	+0 24 22.66	+ 4.01	+43 31 47.0	9.999335
Northfield Minnes.[6]	286	+44 27 41	+7 6 10.9	+70.01	+44 16 10	9.999310
Oakland Californ.[7] .	11	+37 48 5	+9 2 41.2	+89.15	+37 36 57	9.999458
Odessa	55	+46 28 36.2	−1 9 27.5	−11.41	+46 17 6.3	9.999243
Ogden Utah	—	+41 13 8.6	+8 21 34.52	+82.40	+41 1 44.3	9.999372
O-Gyalla (N. Stw.)[8]	—	+47 52 27.3	−0 19 10.69	− 3.15	+47 40 59.9	9.999204
Olmütz[9]	—	+49 35 43	−0 15 33	− 2.55	+49 24 21	9.999160
Oxford (Radcl. Obs.) .	65	+51 45 36.0	+0 58 37.5	+ 9.63	+51 34 24.0	9.999111
Oxford (Univers.) . .	64	+51 45 34.2	+0 58 35.3	+ 9.62	+51 34 22.2	9.999110
Oxford Missouri . .	—	+34 22 12.6	+6 51 42.0	+67.63	+34 11 29.7	9.999540
Padua	31	+45 24 2.5	+0 6 5.71	+ 1.00	+45 12 31.9	9.999268
Palermo	76	+38 6 44.0	+0 0 9.0	+ 0.02	+37 55 33.8	9.999454
Paramatta	—	−33 48 49.8	−9 10 25.3	−90.42	−33 38 12.0	9.999553
Paris (Obs. national) .	59	+48 50 11.2	+0 44 13.88	+ 7.27	+48 38 46.4	9.999183
Paris (Moutsouris) . .	—	+48 49 18.0	+0 44 14.2	+ 7.27	+48 37 53.2	9.999180
Perth (West. Austr.) . .	—	−31 57 9.6	−6 49 46.83	−67.32	−31 46 50.2	9.999596
Petersburg (Akademie)	20	+59 56 29.7	−1 7 38.55	−11.11	+59 46 29.9	9.998915
Petersburg (Univers.)	4	+59 56 32.0	−1 7 36.5	−11.11	+59 46 32.2	9.998914
Philadelphia Pa.[10]	—	+39 57 7.5	+5 54 13.36	+58.19	+39 45 47.9	9.999404
Plonsk[11]	—	+52 37 40.0	−0 27 57.1	− 4.59	+52 26 33.1	9.999085
Pola	32	+44 51 48.6	−0 1 48.00	− 0.30	+44 40 18.0	9.999282

1) Lick Observatory.
2) Vanderbilt Observatory.
3) Yale University. Alte Sternwarte 45″.8 südlich, 1s.58 westlich.
4) Lewis Rutherfurd.
5) Herr R. Bischofsheim.
6) Goodsell Observatory.
7) Chabol Observatory.
8) Dr. von Konkoly.
9) Herr von Unkrechtsberg.
10) Flower Obs. (Univ. of Pennsylvania).
11) Dr. Jedrzejewicz.

Name	Seehöhe	Geogr. Breite	Länge von Berlin + westlich	Corr. der Sternzeit	Geoc. Breite	Log. ρ
	m	° ′ ″	h m s	s	° ′ ″	
Portsmouth	—	+50 48 3	+0 57 59.7	+ 9.53	+50 36 46	9.999130
Potsdam	97	+52 22 56.0	+0 1 19.0	+ 0.22	+52 11 47.6	9.999098
Poughkeepsie N. Y.	—	+41 41 18	+5 49 8.5	+57.36	+41 29 52	9.999360
Prag (Univ.-Stw.)	197	+50 5 18.5	—0 4 6.6	— 0.68	+49 53 58.3	9.999161
Prag [1])	—	+50 4 24	—0 4 13	— 0.69	+49 53 4	9.999148
Princeton N.Y. (N.Stw.)[2])	76	+40 20 55.8	+5 52 14.40	+57.86	+40 9 34.6	9.999399
Providence R. J.[3])	—	+41 49 46.4	+5 39 12.49	+55.72	+41 38 20.2	9.999357
Pulkowa	75	+59 46 18.7	—1 7 43.74	—11.13	+59 36 16.9	9.998922
Quebec Canada	—	+46 48 17.3	+5 38 24.2	+55.59	+46 36 47.9	9.999231
Quito	2846	— 0 14 0	+6 8 55	+60.60	— 0 13 54	0.000194
Riga (Polytechnikum)	—	+56 57 7	—0 42 53	— 7.04	+56 46 35	9.998981
Rio de Janeiro	63	—22 54 23.7	+3 46 16.32	+37.17	—22 46 9.7	9.999786
Rochester N. Y.[4])	172	+43 9 16.8	+6 3 56.74	+59.78	+42 57 47.7	9.999335
Rom (Coll. Rom.)	59	+41 53 53.6	+0 3 39.36	+ 0.61	+41 42 27.3	9.999359
Rom (Capitol)	63	+41 53 33.5	+0 3 38.39	+ 0.60	+41 42 7.2	9.999359
Rom (Vatican) Mer.-Kr.	—	+41 54 16.8	+0 3 45.38	+ 0.62	+41 42 50.4	9.999355
Rousdon	—	+50 42 38	+1 5 33.8	+10.76	+50 31 21	9.999132
Rugby	—	+52 22 7	+0 58 36.9	+ 9.63	+52 10 59	9.999091
St. Louis Missouri	—	+38 38 3.6	+6 54 24.02	+68.08	+38 26 50.4	9.999437
San Fernando	31	+36 27 40.4	+1 18 24.17	+12.88	+36 16 40.8	9.999492
San Francisco Calif.[5])	—	+37 47 28.0	+9 3 17.68	+89.25	+37 36 19.7	9.999457
Santiago (Neue Stw.)	—	—33 26 42.0	+5 36 21.2	+55.24	—33 16 7.6	9.999561
Santiago (Alte Stw.)	619	—33 26 25.4	+5 36 11.7	+55.22	—33 15 51.0	9.999603
Scarborough	—	+54 16 30	+0 55 13.8	+ 9.07	+54 5 36	9.999045
Schwerin	—	+53 37 37.9	+0 7 54.00	+ 1.30	+53 26 37.7	9.999061
Seeberg [6])	356	+50 56 5.2	+0 10 39.75	+ 1.75	+50 44 48.9	9.999151
South Hadley Mass.	—	+42 15 18.2	+5 43 55.25	+56.50	+42 3 50.9	9.999346
Speyer	—	+49 18 55.2	+0 19 49.29	+ 3.26	+49 7 32.0	9.999168
Stockholm	44	+59 20 34.0	—0 18 39.07	— 3.06	+59 10 27.2	9.998930
Stonyhurst	—	+53 50 40.0	+1 3 27.6	+10.42	+53 39 41.3	9.999055
Strafsburg (Prov. Stw.)	161	+48 34 54.0	+0 22 32.41	+ 3.70	+48 23 28.5	9.999197
Strafsburg (Neue Stw.)	144	+48 35 0.2	+0 22 30.25	+ 3.70	+48 23 34.7	9.999196
Sydney	44	—33 51 41.1	—9 11 14.69	—90.55	—33 41 2.8	9.999555

[1]) Herr Safarik. [2]) Alte Sternwarte 2″.0 nördlich, 1ˢ.94 östlich; 65ᵐ.
[3]) Seagrave; Ladd Observatory 1ˢ.57 östlich, 35″ nördlich.
[4]) Lewis Swift. [5]) Davidson Observatory.
[6]) Alte Sternwarte, 1853 nach Gotha verlegt.

Name	Seehöhe	Geogr. Breite	Länge von Berlin + westlich	Corr. der Sternzeit	Geoc. Breite	Log. ρ
	m	° ' "	h m s	s	° ' "	
Tacubaya[1])	2322	+19 24 17.5	+ 7 30 21.40	+ 73.98	+19 17 5.8	9.999999
Taschkent	457	+41 19 31.3	− 3 43 35.89	− 36.73	+41 8 6.6	9.999400
Teramo[2])	—	+42 39 27	− 0 1 21	− 0.22	+42 27 59	9.999336
Tokio	—	+35 39 17.5	− 8 25 23.1	− 83.02	+35 28 24.0	9.999509
Toronto	—	+43 39 35.9	+ 6 11 9.56	+ 60.97	+43 28 6.1	9.999311
Toulouse	194	+43 36 45.3	+ 0 47 43.8	+ 7.84	+43 25 15.6	9.999325
Triest	23	+45 38 45.4	− 0 1 28.10	− 0.24	+45 27 14.9	9.999262
Troy N. Y.	—	+42 43 52.9	+ 5 48 19.5	+ 57.22	+42 32 24.6	9.999334
Tulse Hill[3])	53	+51 26 47.0	+ 0 54 2.6	+ 8.88	+51 15 33.3	9.999118
Turin	270	+45 4 7.3	+ 0 22 47.68	+ 3.74	+44 52 36.7	9.999293
Twickenham[4]) . . .	—	+51 27 4.2	+ 0 54 48.0	+ 9.00	+51 15 50.5	9.999114
Upsala (Neue Sternw.) .	21	+59 51 29.4	− 0 16 55.32	− 2.78	+59 41 28.6	9.998916
Utrecht	12	+52 5 9.5	+ 0 33 3.2	+ 5.43	+51 53 59.3	9.999099
Venedig	—	+45 25 49.5	+ 0 4 10.0	+ 0.68	+45 14 18.9	9.999266
Warschau	110	+52 13 5.7	− 0 30 32.42	− 5.02	+52 1 56.3	9.999102
Washington (A. Stw.) .	31	+38 53 38.9	+ 6 1 47.00	+ 59.43	+38 42 24.3	9.999432
Washington (N. Stw.) .	—	+38 55 14.8	+ 6 1 50.67	+ 59.44	+38 44 0.1	9.999430
Wellington N. Seeland[5])	—	−41 18 0.6	−10 45 31.61	−106.05	−41 6 36.0	9.999370
West Point N. Y. (N. Stw.)[6])	—	+41 23 22	+ 5 49 25.5	+ 57.40	+41 11 57	9.999368
Whitestone N. Y.[7]) .	—	+40 47 21.6	+ 5 48 42.6	+ 57.28	+40 35 58.6	9.999383
Wien (Alte Sternw.) . . .	167	+48 12 35.5	− 0 11 56.79	− 1.96	+48 1 8.9	9.999206
Wien (Josephstadt)[8]) . .	214	+48 12 53.8	− 0 11 50.4	− 1.94	+48 1 27.2	9.999210
Wien (Neue Sternw.) . . .	240	+48 13 55.4	− 0 11 46.58	− 1.93	+48 2 28.9	9.999211
Wien (Ottakring)[9]) . . .	285	+48 12 46.7	− 0 11 36.20	− 1.91	+48 1 20.6	9.999215
Wilhelmshaven . . .	9	+53 31 52.0	+ 0 20 59.70	+ 3.45	+53 20 51.1	9.999064
Williams-Bay Wisc.[10])	—	+42 34 15	+ 6 47 49	+ 66.99	+42 22 47	9.999338
Williamstown Mass. .	—	+42 42 49	+ 5 46 28.4	+ 56.92	+42 31 21	9.999335
Williamstown Vict. .	—	−37 52 7.2	− 8 46 3.2	− 86.42	−37 40 58.4	9.999455
Wilna	122	+54 40 59.1	− 0 47 34.05	− 7.81	+54 30 6.8	9.999043
Windsor N. S. W.[11]) .	—	−33 36 30.8	− 9 9 45.86	− 90.31	−33 25 54.9	9.999558
Zürich	470	+47 22 40.0	+ 0 19 22.5	+ 3.18	+47 11 11.5	9.999248

1) Seit März 1883, früher in Chapultepec.
2) Dr. V. Cerulli.
3) W. Huggins.
4) G. Bishop's Observatory.
5) Mt. Cook Observatory.
6) Seit 1883. Alte Sternwarte 9" nördlich, 1s.2 östlich.
7) Field Observatory.
8) von Oppolzer's Sternwarte.
9) M. v. Kuffner.
10) Yerkes Observatory.
11) J. Tebbutt. Neue Sternwarte, 0".4 südlich von der alten.

Nr. und Name	Opposition 1900	Gr.	m_0	g	Epoche und Osculation	Mittl. Aequ.	M	ω
1 Ceres	Aug. 3	7.8	7.4	4.0	1900 Juli 24.0	d. Ep.	152° 36′ 3″.6	70° 20′ 18″.0
2 Pallas	Juli 5	9.2	8.0	4.5	1900 Juli 24.0	d. Ep.	153 58 40.2	309 16 39.5
3 Juno	Sept. 29	7.4	8.7	5.5	1900 Oct. 4.0	d. Ep.	330 58 54.7	244 44 12.5
4 Vesta	—	—	6.5	4.0	1899 Oct. 9.0	d. Ep.	119 38 30.0	148 21 23.0
5 Astraea	Jan. 3	8.8	9.9	6.9	1898 Sept. 11.0	1900.0	224 4 1.2	353 27 42.1
6 Hebe	Juni 27	8.5	8.5	5.8	1900 Juli 3.0	1900.0	284 20 20.1	236 56 20.0
7 Iris	—	—	8.4	5.8	1900 Jan. 0.0*)	1900.0	9 5 20.1	141 31 26.9
8 Flora	—	—	8.9	6.8	1848 Jan. 1.0*)	d. Ep.	35 52 49.3	282 38 15.6
9 Metis	Juni 13	9.5	8.9	6.3	1858 Juni 30.0*)	d. Ep.	57 4 34.7	2 32 16.9
10 Hygiea	Juni 22	8.9	9.5	5.4	1898 Dec. 20.0	1900.0	291 20 17.9	308 58 5.7
11 Parthenope	Mai 21	9.1	9.3	6.5	1900 Mai 24.0	1900.0	292 39 8.5	193 19 8.9
12 Victoria	Oct. 3	8.9	9.7	7.2	1851 Jan. 0.0*)	d. Ep.	66 2 39.9	66 4 43.3
13 Egeria	Dec. 8	9.9	9.7	6.7	1850 Jan. 0.0*)	d. Ep.	210 46 34.3	76 58 23.7
14 Irene	—	—	9.7	6.6	1898 Oct. 1.0	1900.0	180 47 34.9	92 3 15.9
15 Eunomia	—	—	8.6	5.4	1854 Jan. 0.0*)	d. Ep.	122 5 31.5	93 59 46.0
16 Psyche	Nov. 27	9.1	9.6	5.9	1899 Juli 27.0	1900.0	301 1 33.0	226 3 22.5
17 Thetis	Oct. 22	10.4	10.1	7.3	1900 Oct. 31.0	1900.0	112 53 10.3	137 37 27.9
18 Melpomene	April 15	10.4	9.3	6.9	1854 Jan. 0.0*)	d. Ep.	80 4 37.0	225 1 41.3
19 Fortuna	März 5	10.4	9.8	7.1	1900 März 25.0	1900.0	125 39 18.8	179 40 0.0
20 Massalia	Juli 20	9.9	9.2	6.5	1899 März 29.0	1900.0	76 24 22.5	253 50 39.9
21 Lutetia	März 25	10.8	10.1	7.4	1853 Jan. 2.0*)	d. Ep.	74 20 5.1	246 36 10.2
22 Kalliope	Juni 24	10.2	9.8	6.1	1898 Oct. 1.0	1900.0	96 34 37.0	351 56 41.4
23 Thalia	—	—	10.5	7.3	1900 Jan. 3.0	1900.0	337 2 2.1	55 59 46.7
24 Themis	Sept. 15	11.4	10.8	6.7	1897 Dec. 25.0	1900.0	40 55 3.7	106 58 44.6
25 Phocaea	—	—	10.5	7.9	1898 Aug. 2.0	1900.0	7 21 33.6	88 49 31.0
26 Proserpina	Febr. 9	10.6	10.5	7.3	1853 Juni 11.0*)	d. Ep.	351 5 55.6	190 30 15.7
27 Euterpe	Dec. 40	8.6	9.7	7.2	1873 Jan. 5.0*)	1870.0	90 32 27.0	354 8 6.0
28 Bellona	Jan. 31	9.2	10.1	6.6	1898 Sept. 11.0	1900.0	258 21 43.7	338 30 59.1
29 Amphitrite	Juli 29	9.2	9.0	6.1	1855 Jan. 0.0*)	1870.0	198 1 40.2	59 42 14.8
30 Urania	März 7	10.4	9.9	7.4	1890 Juni 5.0	1900.0	239 51 48.5	83 43 10.7
31 Euphrosyne	—	—	11.0	6.8	1899 Oct. 15.0	1900.0	327 7 12.3	60 23 37.9
32 Pomona	Nov. 21	10.9	10.6	7.5	1855 Jan. 0.0*)	d. Ep.	223 54 39.3	332 38 53.4
33 Polyhymnia	Febr. 14	13.3	11.8	8.2	1900 Jan. 0.0	1900.0	137 40 57.3	334 10 42.4
34 Circe	Juli 23	11.9	11.5	8.2	1897 Dec. 5.0	1900.0	288 24 37.6	326 54 59.7
35 Leukothea	Dec. 36	12.1	12.2	8.3	1898 Sept. 11.0	1900.0	127 21 38.2	205 22 19.6
36 Atalante	Juli 6	12.5	12.0	8.6	1899 Mai 8.0	1900.0	179 27 12.1	44 26 45.4
37 Fides	März 7	10.4	10.4	7.2	1900 März 5.0	1900.0	78 37 55.9	58 50 12.4
38 Leda	Nov. 27	10.6	11.4	8.0	1897 Febr. 8.0	1900.0	31 52 32.7	166 10 52.1
39 Laetitia	Dec. 1	9.2	9.5	6.0	1897 Jan. 19.0	1900.0	111 43 50.9	205 28 8.2
40 Harmonia	Febr. 15	9.0	9.2	6.9	1863 Jan. 0.0*)	d. Ep.	186 48 19.4	267 19 12.8

☊	i	φ	μ	Log. a	Autorität
80° 39′ 7.1″	10° 37′ 21.1″	4° 30′ 14.9″	771.2414″	0.4418775	Godward.
172 49 58.6	34 40 48.3	13 44 16.0	768.6565	0.4428495	Farley.
170 44 28.0	13 1 35.7	14 54 14.4	813.8326	0.4263143	Hind.
103 31 7.5	7 8 16.2	5 7 1.2	977.6889	0.3732039	Farley.
141 31 29.0	5 20 7.2	11 1 8.5	858.1895	0.4109489	Farley.
138 39 42.4	14 48 3.2	11 35 3.1	939.1860	0.3848366	Prof. R. Luther.
260 33 44.3	5 28 1.2	13 20 50.2	962.5828	0.3777123	Dr. Riem.
110 17 16.7	5 53 7.3	9 0 54.4	1086.3382	0.3426943	Prof. Downing.
68 31 35.2	5 36 0.3	7 5 2.4	962.3390	0.3777857	Lesser.
285 48 45.5	3 48 49.8	6 53 27.8	639.1669	0.4962621	Prof. E. Becker.
125 16 47.8	4 37 48.8	5 46 3.4	923.2874	0.3897798	Prof. R. Luther.
235 34 41.7	8 23 17.7	12 38 44.9	994.8347	0.3681389	Brünnow.
43 11 34.5	16 32 24.6	4 59 47.3	857.9451	0.4110315	Hansen.
86 57 12.9	9 7 32.2	9 20 51.3	851.4287	0.4132389	Maywald.
293 52 14.5	11 44 17.4	10 47 32.2	825.4550	0.4222090	Schubert.
150 31 37.1	3 4 30.2	7 50 18.3	710.5554	0.4656058	Schubert.
125 11 47.1	5 36 37.4	7 33 55.8	912.9107	0.3930522	Maywald.
150 3 49.7	10 9 16.9	12 34 20.2	1020.1198	0.3609032	Schubert.
211 15 40.3	1 33 4.3	9 9 40.0	930.1666	0.3876305	A. Berberich.
206 37 45.2	0 41 11.9	8 17 46.2	949.0005	0.3818268	Prof. Küstner.
80 27 48.5	3 5 9.5	9 19 44.6	933.5544	0.3865780	Lesser.
66 33 27.0	13 43 36.7	5 38 34.5	714.4288	0.4640317	A. Berberich.
67 50 20.9	10 13 2.0	13 32 59.4	833.5369	0.4193879	Schubert.
35 39 6.4	0 48 8.1	7 50 15.3	640.5990	0.4956138	Krueger.
214 13 50.6	21 36 44.5	14 39 21.4	954.0992	0.3802754	A. Berberich.
45 54 59.3	3 35 47.7	5 0 37.3	819.6847	0.4242399	Hoek.
93 51 20.1	1 35 30.4	10 0 56.0	986.6944	0.3705493	Prof. Hoppe.
144 43 16.1	9 21 37.4	8 38 54.6	765.9782	0.4438601	Oberstl. v. d. Groeben.
356 40 46.5	6 7 4.6	4 15 25.3	869.0352	0.4073128	Prof. E. Becker.
308 15 7.4	2 5 59.5	7 21 5.1	975.3144	0.3739080	Günther.
31 45 6.4	26 28 3.3	12 52 34.7	635.0803	0.4981187	Schubert.
220 42 55.2	5 28 49.9	4 45 43.1	852.5880	0.4128449	Lesser.
9 7 49.5	1 55 15.8	19 41 13.8	731.7057	0.4571134	Prof. Newcomb.
184 49 41.0	5 27 26.3	6 4 35.9	805.6011	0.4292575	Prof. Auwers.
355 47 23.7	8 11 44.8	12 42 36.2	683.6866	0.4767663	Tietjen.
359 6 46.3	18 39 39.3	17 26 19.0	777.3458	0.4395950	Schubert.
8 7 10.9	3 6 14.1	10 15 7.8	826.9450	0.4216867	Prof. R. Luther.
296 29 4.4	6 57 52.6	8 53 45.4	781.8518	0.4379215	A. Berberich.
157 24 53.4	10 22 11.4	6 23 16.8	769.6407	0.4424791	Tietjen.
93 34 54.2	4 15 48.4	2 40 13.6	1039.3353	0.3555000	Schubert.

Nr. und Name	Opposition 1900	Gr.	m_0	g	Epoche und Osculation	Mittl. Aequ.	M	ω
41 Daphne . .	Dec. 2	11.6	10.5	7.0	1896 Dec. 30.0	1900.0	278° 7′ 19.3″	41° 56′ 43.2″
42 Isis	—	—	10.4	7.7	1901 März 20.0	1900.0	220 37 25.4	234 12 19.6
43 Ariadne . .	Aug. 20	9.1	10.0	7.9	1897 Oct. 6.0	1900.0	80 15 48.4	13 59 41.2
44 Nysa	Oct. 29	9.2	9.8	7.1	1891 April 1.0	1900.0	101 29 32.1	340 32 15.8
45 Eugenia . .	—	—	10.7	7.3	1890 Nov. 12.0	1900.0	180 7 31.7	82 42 47.8
46 Hestia . . .	März 22	11.5	10.6	7.7	1900 März 5.0	1900.0	185 43 16.4	172 51 10.1
47 Aglaja . . .	Mai 16	10.9	11.2	7.5	1898 Dec. 20.0	1900.0	193 12 16.1	310 0 51.6
48 Doris	Juni 22	11.2	10.9	6.8	1890 Sept. 13.0	1900.0	277 3 7.4	251 36 35.0
49 Pales	Juli 17	11.0	11.0	7.0	1898 März 15.0	1900.0	133 1 8.6	104 18 44.6
50 Virginia . .	Aug. 31	9.8	11.7	8.5	1890 April 6.0	1900.0	193 9 42.2	196 47 34.5
51 Nemausa . .	Dec. 8	9.9	9.8	7.3	1889 Nov. 17.0	1900.0	254 26 43.1	358 30 23.3
52 Europa . . .	Dec. 24	9.6	10.3	6.2	1891 April 1.0	1900.0	65 39 33.0	335 58 38.7
53 Kalypso . .	Jan. 21	10.5	11.5	8.4	1898 Sept. 11.0	1900.0	262 39 8.8	309 50 4.2
54 Alexandra .	—	—	10.9	7.6	1884 Aug. 15.0	1900.0	316 55 13.5	341 53 51.5
55 Pandora . .	Dec. 38	10.8	10.8	7.4	1885 Jan. 22.0	1900.0	263 33 12.6	0 46 45.4
56 Melete . . .	Dec. 31	12.4	11.3	8.2	1900 Dec. 10.0	1900.0	152 34 12.0	101 6 1.9
57 Mnemosyne	—	—	10.7	6.5	1897 Juni 28.0	1900.0	231 1 17.6	210 8 12.7
58 Concordia .	März 29	11.2	11.6	8.3	1865 Jan. 7.0	d. Ep.	21 24 4.2	27 50 14.7
59 Elpis	Aug. 27	10.4	10.9	7.6	1865 Jan. 7.0	1900.0	334 18 57.1	207 58 22.3
60 Echo	Juni 29	12.1	11.1	8.5	1897 Oct. 6.0	1900.0	272 15 22.3	267 58 4.0
61 Danaë . . .	April 14	11.5	11.0	7.1	1900 April 14.0	1900.0	244 20 50.4	8 27 33.5
62 Erato	—	—	12.3	8.2	1877 Sept. 21.0	1900.0	358 43 44.3	273 16 41.1
63 Ausonia . .	Dec. 13	10.6	9.9	7.3	1898 Febr. 3.0	1900.0	250 44 8.5	292 55 25.5
64 Angelina . .	Jan. 2	9.7	10.5	7.2	1898 Oct. 1.0	1900.0	239 38 51.2	173 37 28.8
65 Cybele . . .	Juni 8	10.4	11.0	6.4	1900 Juni 13.0	1900.0	0 34 8.2	97 52 20.2
66 Maja	April 14	13.0	12.2	9.0	1897 Juli 18.0	1900.0	277 50 28.5	40 10 9.2
67 Asia	Dec. 24	12.0	11.2	8.5	1897 Dec. 5.0	1900.0	201 20 50.1	103 20 37.7
68 Leto	Dec. 20	10.5	10.5	7.0	1898 April 24.0	1900.0	236 41 25.3	301 43 40.3
69 Hesperia . .	Oct. 13	10.5	10.7	6.8	1889 Jan. 1.0	1900.0	182 52 57.9	284 43 39.6
70 Panopaea .	Oct. 18	10.6	10.9	7.8	1890 Dec. 22.0	1900.0	305 21 16.5	252 49 22.9
71 Niobe . . .	—	—	10.7	7.3	1898 Oct. 1.0	1900.0	134 2 10.3	265 39 20.2
72 Feronia . .	Dec. 10	11.6	11.2	8.9	1897 Dec. 25.0	1900.0	166 4 16.3	100 27 36.6
73 Klytia . . .	—	—	12.0	8.8	1898 Aug. 2.0	1900.0	244 29 53.1	52 42 12.0
74 Galatea . .	Dec. 56	12.1	11.8	8.3	1897 Febr. 28.0	1900.0	148 4 45.2	171 0 3.8
75 Eurydike . .	März 25	12.8	11.6	8.4	1897 Oct. 26.0	1900.0	32 23 13.9	335 34 2.0
76 Freia	Nov. 13	11.2	12.0	7.4	1900 Nov. 20.0	1900.0	333 40 15.1	236 35 54.8
77 Frigga . . .	Mai 26	11.8	11.1	7.9	1897 Oct. 6.0	1900.0	331 13 52.7	56 51 27.7
78 Diana . . .	—	—	10.6	7.5	1899 Sept. 6.0	1900.0	253 25 1.6	148 55 27.0
79 Eurynome .	Mai 9	11.5	10.5	7.8	1900 Mai 24.0	1900.0	188 49 51.5	198 14 19.0
80 Sappho . . .	Dec. 46	11.0	10.6	8.2	1896 Oct. 11.0	1900.0	19 11 20.1	136 54 29.1

☊	i	φ	μ	Log. a	Autorität
178° 54′ 57″.1	15° 55′ 27″.6	15° 27′ 11″.7	770″.8841	0.4420117	A. Berberich.
84 21 28.4	8 34 3.0	12 50 33.9	930.2275	0.3876117	Prof. L. Becker.
264 44 16.3	3 27 42.6	9 38 32.6	1084.7577	0.3431159	Prof. A. Prey.
131 15 10.2	3 42 4.2	8 48 10.9	941.7363	0.3840515	Powalky.
148 7 49.1	6 35 22.7	4 44 11.6	791.0695	0.4345280	Oberstl. Richter.
181 25 54.1	2 17 33.5	9 35 32.3	884.5855	0.4021779	Prof. Karlinski.
4 3 41.5	5 0 34.6	7 42 46.5	726.7211	0.4590926	Powalky.
184 42 28.7	6 30 28.0	3 30 16.7	645.5014	0.4934063	Powalky.
289 40 40.8	3 8 26.3	12 52 28.4	648.4530	0.4920854	Powalky.
173 47 19.2	2 48 31.7	16 45 58.0	823.5561	0.4228757	Powalky.
175 52 45.4	9 57 16.2	3 51 23.3	975.1593	0.3739540	A. Berberich.
129 49 21.9	7 26 18.3	6 31 44.8	651.8134	0.4905889	Murmann.
143 54 57.8	5 7 29.0	11 56 45.7	837.9945	0.4178437	Tietjen.
313 53 45.7	11 47 33.9	11 31 49.2	795.5362	0.4328971	Herm. Schultz.
11 5 29.9	7 13 21.5	8 18 56.3	774.4612	0.4406713	Prof. Moeller.
194 2 28.2	8 3 13.9	13 24 3.3	846.1050	0.4150549	Prof. R. Luther.
200 1 43.4	15 11 43.8	6 49 36.3	635.2903	0.4980229	Adolph.
161 19 50.3	5 1 50.5	2 26 21.8	799.5964	0.4314238	Oppolzer.
170 49 39.2	8 36 57.8	6 44 2.7	793.9788	0.4334651	Oppolzer.
191 53 22.7	3 35 6.7	10 34 22.7	958.2244	0.3790263	C. H. F. Peters.
334 15 0.8	18 14 58.7	9 29 23.8	688.3554	0.4747959	Prof. R. Luther.
125 59 38.4	2 12 18.6	10 6 47.4	642.5659	0.4947260	Oppolzer.
337 58 3.7	5 47 11.4	7 17 58.7	957.1671	0.3793459	Tietjen.
310 50 59.6	1 19 34.2	7 17 59.7	807.9036	0.4284314	Oppolzer.
158 48 22.8	3 28 43.4	5 51 5.0	556.3938	0.5364162	Fritsche.
8 17 30.6	3 4 58.6	10 3 43.4	824.7740	0.4224477	Maywald.
202 55 26.2	5 59 14.6	10 47 54.5	942.3560	0.3838611	Frischauf.
44 42 44.5	7 58 21.8	10 39 16.0	763.4868	0.4448033	Th. Wolff.
186 40 56.4	8 29 52.2	9 39 2.0	689.6731	0.4742422	Dr. Kowalczyk.
48 15 50.9	11 38 20.8	10 22 15.9	838.9960	0.4174978	Oberstl. Richter.
316 22 37.2	23 16 53.8	9 57 51.8	775.1865	0.4404003	Prof. E. Becker.
207 54 6.8	5 23 56.2	6 56 42.6	1040.3544	0.3552169	C. H. F. Peters.
7 35 28.1	2 24 13.1	2 34 3.9	816.0117	0.4255401	Powalky.
197 44 15.2	4 0 26.4	13 43 0.6	764.6230	0.4443728	Maywald.
359 58 28.1	4 59 51.2	17 45 42.2	812.4299	0.4268137	Stockwell.
212 10 57.8	2 2 45.5	9 44 21.2	562.3352	0.5333409	Murmann.
2 4 10.7	2 27 29.8	7 38 43.5	813.8298	0.4263153	Dr. Plath.
333 51 33.1	8 41 18.7	12 5 4.7	837.1977	0.4181191	Prof. v. Dubjago.
206 38 20.1	4 36 12.4	11 0 31.8	927.2856	0.3885287	Dr. Lachmann.
218 40 52.1	8 37 21.0	11 34 29.9	1020.1090	0.3609067	Oberstl. v. d. Groeben.

Nr. und Name	Opposition 1900	Gr.	m_0	g	Epoche und Osculation	Mittl. Aequ.	M	ω
81 Terpsichore	März 10	12.2	11.8	8.2	1897 Juli 18.0	1900.0	260° 37′ 9.1″	46° 14′ 45.4″
82 Alkmene . .	Sept. 16	12.0	11.2	7.8	1900 Sept. 11.0	1900.0	236 55 47.1	107 7 48.0
83 Beatrix . . .	Aug. 20	11.6	11.3	8.6	1891 Jan. 11.0	1900.0	295 16 6.4	163 24 10.4
84 Klio	Febr. 23	12.6	11.3	8.8	1897 April 29.0	1900.0	252 50 4.7	12 50 33.4
85 Io	Dec. 2	11.0	10.9	7.7	1889 Febr. 10.0	1900.0	180 9 35.1	120 16 29.3
86 Semele . . .	Febr. 16	12.7	12.4	8.3	1896 Mai 4.0	1900.0	203 38 24.5	300 25 0.9
87 Sylvia . . .	Sept. 20	11.4	11.9	7.2	1898 April 24.0	1900.0	236 42 47.7	265 34 8.9
88 Thisbe . . .	—	—	10.8	7.4	1889 Dec. 27.0	1900.0	25 33 30.8	30 51 35.1
89 Julia	—	—	10.1	7.1	1889 Dec. 27.0	1900.0	237 15 2.3	42 50 30.0
90 Antiope . .	Nov. 7	11.7	11.6	7.5	1898 April 4.0	1900.0	277 45 51.5	231 43 15.5
91 Aegina . . .	Dec. 60	12.4	11.3	8.2	1895 Oct. 17.0	1900.0	301 7 37.1	71 47 2.1
92 Undina . . .	April 29	11.0	10.9	6.7	1896 Sept. 1.0	1900.0	30 19 59.7	222 11 3.2
93 Minerva . .	Dec. 11	11.5	10.8	7.4	1897 Jan. 19.0	1900.0	213 22 8.2	270 51 58.5
94 Aurora . . .	Juli 27	11.4	11.3	7.1	1883 Juli 12.0	1900.0	256 3 4.3	45 22 31.8
95 Arethusa . .	—	—	11.3	7.3	1897 April 29.0	1900.0	187 44 18.9	150 12 20.9
96 Aegle . . .	Febr. 12	10.5	11.4	7.4	1897 Sept. 16.0	1900.0	182 59 36.0	200 34 38.9
97 Klotho . . .	Juni 23	11.7	10.6	7.4	1898 Jan. 14.0	1900.0	21 4 31.9	264 36 3.6
98 Ianthe . . .	Aug. 1	12.4	11.6	8.3	1897 Nov. 15.0	1900.0	283 55 20.7	155 6 36.5
99 Dike	Jan. 24	14.5	14	10.5	1868 Juni 5.0	1890.0	350 36 11	198 52 26
100 Hekate . . .	Mai 24	11.3	11.9	7.8	1898 Jan. 14.0	1900.0	156 19 38.0	176 49 22.9
101 Helena . . .	März 27	11.2	10.7	7.6	1897 Aug. 27.0	1900.0	8 56 38.1	343 58 29.0
102 Miriam . . .	Jan. 5	12.8	12.6	9.4	1898 Juli 13.0	1900.0	319 11 42.8	143 39 2.3
103 Hera	Dec. 28	10.5	10.2	6.9	1897 Febr. 8.0	1900.0	173 11 18.9	185 58 23.1
104 Klymene . .	Juni 1	12.9	12.2	8.0	1897 Dec. 25.0	1900.0	35 9 54.6	19 59 38.3
105 Artemis . .	April 6	10.3	11.1	8.5	1897 Aug. 27.0	1900.0	69 55 41.8	54 43 29.2
106 Dione . . .	Mai 8	12.1	11.3	7.2	1900 April 14.0	1900.0	204 55 38.9	323 11 43.3
107 Camilla . . .	Sept. 23	11.3	11.2	6.5	1891 April 21.0	1900.0	97 7 57.4	293 58 0.6
108 Hecuba . . .	Sept. 15	12.2	11.7	7.4	1900 Sept. 1.0	1900.0	183 56 17.6	175 3 9.5
109 Felicitas . .	Oct. 6	10.3	12.0	8.7	1898 Jan. 14.0	1900.0	115 33 32.5	52 23 0.4
110 Lydia . . .	—	—	10.5	7.1	1888 Febr. 16.0	1900.0	197 35 50.6	279 6 17.0
111 Ate	Nov. 2	11.0	11.3	8.2	1890 Jan. 16.0	1900.0	91 26 4.4	163 35 29.2
112 Iphigenia .	Juli 27	10.8	11.5	8.8	1897 Dec. 25.0	1900.0	88 12 11.4	14 8 43.2
113 Amalthea .	Jan. 27	10.8	11.0	8.4	1900 Jan. 24.0	1900.0	296 3 39.4	76 59 14.4
114 Kassandra .	Jan. 31	10,3	11.1	7.8	1889 Sept. 18.0	1900.0	211 30 3.4	348 48 21.0
115 Thyra . . .	Juni 24	10.9	10.4	7.8	1897 Oct. 6.0	1900.0	340 57 26.1	94 2 54.5
116 Sirona . . .	—	—	10.7	7.3	1889 Juni 10.0	1900.0	158 3 13.7	89 5 27.1
117 Lomia . . .	März 21	11.5	11.4	7.5	1897 Oct. 6.0	1900.0	332 35 55.4	48 38 21.5
118 Peitho . . .	Juli 31	11.3	10.8	8.1	1900 Juli 23.0	1900.0	239 56 50.6	31 24 54.4
119 Althaea . .	—	—	10.6	7.5	1898 Aug. 2.0	1900.0	314 33 34.0	168 35 13.5
120 Lachesis . .	Mai 3	11.4	11.7	7.6	1897 Nov. 15.0	1900.0	202 19 20.3	238 31 18.5

Ω	i	φ	μ	Log. a	Autorität
2° 26′ 3″.2	7° 55′ 0″.8	12° 11′ 52″.3	736″.4126	0.4552583	Maywald.
26 30 48.7	2 51 15.8	12 51 55.9	773.3986	0.4410688	Dr. W. Luther.
27 39 29.7	4 59 45.5	4 51 24.3	935.9122	0.3858476	Prof. E. Becker.
327 31 22.2	9 21 24.6	13 40 0.3	977.4411	0.3732774	Prof. Neugebauer.
203 46 47.4	11 53 51.6	11 10 33.7	821.0524	0.4237571	Oberstl. v. d. Groeben.
87 54 38.5	4 47 37.3	12 46 54.2	650.4530	0.4911938	Oberstl. v. d. Groeben.
75 7 59.2	10 53 1.0	5 26 44.5	545.3288	0.5422321	Oberstl. v. d. Groeben.
277 42 47.1	5 14 53.7	9 26 6.4	771.1774	0.4419015	Dr. Kowalczyk.
311 52 22.1	16 12 28.5	10 33 29.3	871.5645	0.4064714	Th. Wolff.
71 13 4.8	2 16 17.0	8 53 22.1	632.5389	0.4992796	Maywald.
10 57 44.3	2 8 21.7	6 5 9.2	851.5394	0.4132012	Oberstl. v. d. Groeben.
102 55 42.7	9 55 52.0	5 35 51.8	622.7897	0.5037768	Dr. Anderson.
4 56 14.6	8 35 23.4	8 1 55.7	775.6316	0.4402341	Prof. P. Lehmann.
4 25 0.9	8 4 14.0	4 44 18.3	630.6584	0.5001416	Leppig.
244 1 45.9	12 55 10.2	8 49 13.9	661.2229	0.4864391	Prof. Schur.
322 38 39.2	16 2 20.5	7 39 35.3	663.1502	0.4855965	L. Schulhof.
160 48 52.0	11 45 33.9	14 51 9.7	813.5778	0.4264050	Maywald.
354 17 48.6	15 33 54.4	10 50 24.7	805.3408	0.4293513	Oberstl. v. d. Groeben.
42 1 35	13 53 24	13 47 30	758.662	0.44664	Loewy u. Tisserand.
128 18 46.9	6 23 10.8	9 31 58.5	653.5823	0.4898043	Dr. Stark.
343 34 25.3	10 10 28.2	8 1 10.2	854.8620	0.4120737	Oberstl. v. d. Groeben.
211 30 18.2	5 5 28.2	14 44 31.2	817.8380	0.4248929	C. H. F. Peters.
136 18 9.4	5 24 36.7	4 30 21.3	798.0990	0.4319669	Leveau.
43 6 17.3	2 52 51.5	8 32 48.6	632.5948	0.4992527	A. Berberich.
188 6 29.5	21 30 59.6	10 6 59.0	970.4600	0.3753527	Prof. A. Leman.
63 13 27.4	4 37 1.1	9 33 38.8	629.1696	0.5008259	A. Berberich.
176 5 37.5	9 51 44.3	3 56 39.0	544.1827	0.5428412	Dr. Matthiessen.
352 23 46.1	4 23 32.6	6 2 52.0	617.8856	0.5060657	L. Schulhof.
4 34 5.3	8 0 56.7	17 12 53.0	799.9088	0.4313108	Oberstl. v. d. Groeben.
57 21 12.6	5 59 43.0	4 37 36.1	785.9425	0.4364105	H. Oppenheim.
306 30 48.3	4 56 17.0	5 58 35.2	849.9712	0.4137349	Dr. Holetschek.
324 4 8.9	2 37 5.2	7 25 29.0	934.8048	0.3861905	Tietjen.
123 14 23.8	5 2 3.9	5 1 18.0	969.0731	0.3757667	Dr. W. Luther.
164 32 42.0	4 53 58.4	7 55 32.6	810.5220	0.4274945	Dr. F. Anton.
309 11 11.8	11 35 33.0	11 5 7.8	966.3219	0.3765898	Watson.
64 34 59.8	3 35 8.7	8 3 59.9	770.3736	0.442203	H. Oppenheim.
349 32 55.0	14 56 16.5	1 31 51.9	685.2178	0.4761187	Tietjen.
47 35 7.8	7 46 29.3	9 23 46.9	932.7235	0.3868358	Dr. Holetschek.
203 49 19.0	5 44 19.9	4 42 49.9	855.7364	0.4117777	A. Berberich.
342 37 18.6	7 0 12.0	3 30 1.0	645.4399	0.4934339	Dr. Plath.

Nr. und Name	Opposition 1900	Gr.	m_0	g	Epoche und Osculation	Mittl. Aequ.	M	ω
121 Hermione . .	Dec. 3	11.0	11.2	6.6	1900 Nov. 20.0	1900.0	57° 32′ 29.″1	280° 13′ 19.″1
122 Gerda	Juni 2	11.3	11.5	7.2	1900 Mai 24.0	1900.0	55 49 33.7	16 1 28.9
123 Brunhild . .	—	—	11.8	8.5	1898 Juni 23.0	1900.0	210 35 25.0	122 14 47.2
124 Alkeste . . .	Jan. 4	10.6	10.3	7.1	1890 Dec. 2.0	1900.0	180 26 7.9	58 14 55.4
125 Liberatrix .	Nov. 30	11.6	11.2	7.8	1897 Jan. 19.0	1900.0	202 46 5.6	104 32 50.8
126 Velleda . . .	—	—	11.5	8.8	1899 Dec. 15.0	1900.0	81 59 24.9	325 45 47.1
127 Johanna . .	Dec. 27	10.2	10.5	7.1	1890 Oct. 3.0	1900.0	251 23 46.9	90 26 1.5
128 Nemesis . .	—	—	10.6	7.2	1897 Jan. 19.0	1900.0	144 20 2.3	300 33 17.2
129 Antigone . .	Nov. 25	11.3	10.3	6.6	1897 Jan. 19.0	1900.0	253 10 0.2	103 42 13.1
130 Elektra . . .	Jan. 13	10.5	10.6	6.5	1898 Aug. 22.0	1900.0	337 5 55.3	233 45 56.0
131 Vala	Aug. 5	12.2	12.2	9.5	1898 Dec. 20.0	1900.0	288 37 28.9	155 55 32.5
132 Aethra . . .	Jan. 28	8.7	11.1	8.0	1895 Nov. 30.5	1900.0	330 47 37.2	252 15 8.1
133 Cyrene . . .	Sept. 21	11.5	11.3	7.3	1898 Jan. 14.0	1900.0	280 4 53.4	283 57 53.9
134 Sophrosyne .	März 29	11.4	11.1	8.1	1897 Juli 18.0	1900.0	235 51 37.8	81 26 4.1
135 Hertha . . .	Jan. 27	11.5	10.5	7.8	1898 Oct. 1.0	1900.0	33 3 56.2	337 8 16.8
136 Austria . . .	Dec. 36	11.7	11.2	8.9	1898 März 15.0	1900.0	211 14 20.2	130 29 0.4
137 Meliboea . .	Jan. 12	12.8	11.8	7.7	1898 Nov. 10.0	1900.0	80 12 0.8	105 36 1.8
138 Tolosa . . .	Febr. 23	12.7	11.8	9.1	1896 Febr. 14.0	1900.0	190 23 49.0	258 2 25.2
139 Juewa	Mai 10	10.4	10.9	7.4	1898 Nov. 30.0	1900.0	299 0 11.9	162 8 46.4
140 Siwa	April 25	11.0	11.4	8.0	1898 Oct. 1.0	1900.0	173 35 23.3	193 10 59.4
141 Lumen . . .	—	—	11.4	8.2	1890 Aug. 24.0	1900.0	321 2 54.7	54 13 48.3
142 Polana . . .	Dec. 18	12.7	12.2	9.5	1896 Dec. 10.0	1900.0	211 12 47.7	290 0 26.5
143 Adria	Sept. 29	12.8	12.4	9.0	1891 Oct. 18.0	1900.0	160 45 41.3	248 47 54.2
144 Vibilia . . .	April 1	11.9	10.7	7.5	1888 Juli 18.0	1900.0	289 54 28.9	290 44 14.9
145 Adeona . . .	Jan. 11	10.5	11.3	8.1	1898 Aug. 22.0	1900.0	240 12 41.7	40 32 42.2
146 Lucina . . .	—	—	11.1	7.7	1898 Aug. 2.0	1900.0	89 1 10.2	140 57 15.8
147 Protogeneia .	—	—	12.5	8.4	1898 Sept. 11.0	1900.0	348 52 28.8	122 48 3.8
148 Gallia	Jan. 15	10.6	11.0	7.5	1900 Jan. 24.0	1900.0	60 23 35.9	250 58 41.6
149 Medusa . . .	Mai 29	13.4	12.9	11.0	1900 Mai 24.0	1900.0	200 8 29.0	249 43 18.4
150 Nuwa	Juli 15	11.1	11.6	7.7	1893 März 1.0	1900.0	155 36 25.8	146 42 52.7
151 Abundantia	Nov. 5	11.8	11.7	8.6	1896 Nov. 20.0	1900.0	255 13 12.2	131 0 0.9
152 Atala	April 8	12.4	12.2	8.1	1899 Jan. 29.0	1900.0	27 31 7.9	42 36 44.3
153 Hilda	Dec. 31	13.4	12.6	7.3	1901 Jan. 19.0	1900.0	178 32 13.6	54 47 13.4
154 Bertha . . .	Jan. 31	11.2	12.2	7.0	1900 Jan. 4.0	1900.0	290 52 56.2	161 15 28.8
155 Scylla	Dec. 2	11.9	13.5	9.8	1875 Nov. 8.5	1890.0	339 4 47	39 9 28
156 Xanthippe .	Aug. 18	13.1	11.9	7.9	1875 Nov. 27.5	1900.0	286 31 33.6	269 45 21.1
157 Dejanira . .	Dec. 18	13.3	14.7	11.6	1875 Dec. 27.5	1900.0	340 48 39.7	43 53 50.3
158 Koronis . . .	—	—	12.3	8.7	1898 Aug. 22.0	1900.0	278 50 53.8	138 47 33.9
159 Aemilia . . .	Mai 24	12.6	12.3	8.2	1897 Dec. 5.0	1900.0	324 40 17.3	331 52 26.4
160 Una	Juli 9	12.0	11.8	8.4	1897 Dec. 25.0	1900.0	33 30 8.8	46 47 11.5

☊	i	φ	μ	Log. a	Autorität
76° 42′ 14.7″	7° 34′ 51.6″	7° 59′ 0.0″	554.″6699	0.5373147	A. Berberich.
178 44 48.9	1 36 30.9	2 58 8.0	614.0713	0.5078585	H. Lange.
308 29 36.1	6 25 24.3	7 1 21.7	802.5894	0.4303421	A. Berberich.
188 28 29.7	2 55 33.8	4 27 41.2	832.2976	0.4198186	Prof. Hall sen.
169 28 0.9	4 38 1.7	4 29 45.0	780.9349	0.4382611	H. Lange.
23 19 47.4	2 56 23.6	6 3 49.4	931.5174	0.3872104	Oberstl. v. d. Groeben.
31 45 41.1	8 15 39.0	3 47 29.9	775.8987	0.4401344	Maywald.
76 37 27.9	6 15 7.7	7 13 52.8	778.9624	0.4389934	Dr. de Ball.
137 50 3.1	12 10 5.6	12 15 18.0	730.5585	0.4575677	Austin.
146 8 24.2	22 58 6.0	12 29 21.9	646.4298	0.4929901	Powalky.
65 29 50.6	4 57 45.6	3 51 52.5	935.8550	0.3858654	A. Berberich.
260 2 56.6	23 32 20.3	19 21 13.8	903.6882	0.3959920	Dr. W. Luther.
321 17 10.0	7 13 46.2	8 2 47.1	662.6045	0.4858348	Oberstl. v. d. Groeben.
346 19 4.3	11 36 9.5	6 43 11.6	864.4642	0.4088397	Maywald.
344 4 53.8	2 18 29.8	11 45 17.6	937.0637	0.3854917	Maywald.
186 12 30.0	9 33 16.6	4 52 0.8	1025.7532	0.3593092	H. Oppenheim.
203 39 7.8	13 21 11.9	12 46 22.0	645.4607	0.4934245	H. Lange.
54 46 47.0	3 13 19.7	9 16 35.8	924.9117	0.3892709	Oberstl. v. d. Groeben.
2 24 42.8	10 55 14.3	9 57 48.4	764.0768	0.4445797	A. Berberich.
107 7 8.1	3 11 31.2	12 31 19.9	786.6737	0.4361413	Oberstl. v. d. Groeben.
319 19 51.6	11 58 35.4	12 16 57.4	814.6615	0.4260196	A. Berberich.
291 51 30.9	2 14 26.9	7 44 10.6	943.5246	0.3835023	Prof. L. Becker.
333 46 15.4	11 30 8.9	4 8 20.2	773.3958	0.4410699	von Haerdtl.
76 53 48.3	4 48 16.3	13 28 14.3	819.4849	0.4243104	Powalky.
77 47 51.1	12 41 9.8	8 24 20.6	812.2212	0.4268915	Tietjen.
84 18 41.5	13 5 8.8	3 39 14.6	791.4186	0.4344003	A. Berberich.
251 10 53.0	1 54 16.5	2 2 8.6	638.8069	0.4964247	Prof. L. Becker.
145 10 48.7	25 20 40.3	10 42 16.6	769.6223	0.4424860	Prof. L. Becker.
158 40 24.6	0 55 44.4	3 50 11.2	1105.8897	0.3375299	H. Lange.
207 40 28.0	2 8 22.3	7 20 7.3	689.2534	0.474418	H. Oppenheim.
38 54 32.6	6 28 11.9	2 9 0.7	850.8980	0.4134194	Oberstl. v. d. Groeben.
41 16 53.9	12 13 18.0	4 12 12.4	637.2942	0.4971111	H. Lange.
228 21 15.3	7 51 44.1	9 31 9.8	449.9321	0.5979065	Dr. Kühnert.
37 21 31.9	20 54 29.3	4 39 8.1	622.4711	0.5039249	Dr. Anton.
43 4 14	14 4 25	14 49 28	713.7875	0.464292	L. Schulhof.
246 32 22.5	7 28 34.7	15 17 23.2	670.230	0.482522	Dr. A. Schmidt.
62 46 20.9	12 2 7.9	12 8 59.6	854.8040	0.4120934	Prof. A. Leman.
280 59 33.3	0 59 59.3	3 17 38.9	730.4848	0.4575969	Maywald.
135 4 8.9	6 4 58.6	5 37 45.9	647.4107	0.492551	A. Berberich.
9 16 50.3	3 51 17.9	3 45 8.1	787.7290	0.435753	Prof. Neugebauer.

Nr. und Name	Opposition 1900	Gr.	m_0	g	Epoche und Osculation	Mittl. Aequ.	M	ω
161 Athor	—	—	11.0	8.4	1896 Dec. 30.0	1900.0	142° 39′ 1″.6	291° 48′ 21″.8
162 Laurentia . .	Nov. 24	12.0	12.3	8.4	1899 Sept. 6.0	1900.0	215 30 54.3	106 2 12.0
163 Erigone . . .	—	—	12.0	9.5	1899 Aug. 17.0	1900.0	244 4 42.0	295 32 50.9
164 Eva	März 3	12.4	11.5	8.3	1900 Febr. 13.0	1900.0	127 58 28.1	281 50 6.4
165 Loreley . . .	Dec. 32	11.5	11.1	7.0	1897 April 9.0	1900.0	290 21 20.7	342 30 31.3
166 Rhodope . . .	Jan. 25	12.2	12.5	9.2	1897 Juni 8.0	1900.0	213 52 27.9	261 28 34.0
167 Urda	Aug. 12	12.8	13.0	9.4	1898 Jan. 14.0	1900.0	197 17 5.7	121 7 27.8
168 Sibylla	Juli 21	11.5	11.6	7.1	1899 Mai 29.0	1900.0	218 22 50.2	174 27 5.8
169 Zelia	März 3	12.0	11.3	8.8	1890 Aug. 4.0	1900.0	328 1 8.3	332 10 48.0
170 Maria	Nov. 17	11.5	11.7	8.7	1900 Nov. 20.0	1900.0	325 25 32.4	155 58 47.2
171 Ophelia . . .	April 9	11.6	12.1	8.0	1897 Oct. 6.0	1900.0	236 0 17.5	50 25 52.0
172 Baucis	Juni 23	10.0	10.4	7.8	1889 Juni 30.0	1900.0	316 43 41.4	356 48 38.4
173 Ino	Oct. 24	9.8	11.0	7.6	1897 Jan. 19.0	1900.0	71 13 19.6	224 39 33.8
174 Phaedra . . .	April 1	11.2	11.6	8.0	1897 Oct. 6.0	1900.0	129 24 10.1	286 21 28.5
175 Andromache.	Sept. 19	11.2	12.3	8.0	1900 Mai 24.0	1900.0	359 9 23.4	301 33 41.9
176 Idunna . . .	Nov. 11	10.2	12.1	7.9	1900 Nov. 20.0	1900.0	18 26 49.8	182 37 23.7
177 Irma	Oct. 25	10.9	12.4	9.0	1897 Jan. 19.0	1900.0	71 42 48.0	33 16 24.6
178 Belisana . . .	Oct. 18	12.1	12.0	9.2	1900 Oct. 11.0	1900.0	115 12 44.4	212 7 59.0
179 Klytæmnestra	März 15	12.1	11.5	7.7	1897 Oct. 6.0	1900.0	14 32 37.3	100 30 36.1
180 Garumna . .	—	—	13.3	9.9	1899 Nov. 5.0	1900.0	308 53 34.6	169 15 49.3
181 Eucharis . .	Febr. 9	10.5	11.5	7.4	1887 Oct. 19.0	1900.0	305 49 36.6	310 26 13.3
182 Elsa	—	—	11.0	8.3	1897 März 20.0	1900.0	102 51 45.1	308 14 46.6
183 Istria	Dec. 17	10.7	12.6	9.1	1900 Dec. 10.0	1900.0	15 47 41.4	262 25 52.0
184 Dejopeja . . .	—	—	12.4	8.2	1901 März 20.0	1900.0	1 33 52.9	204 47 47.4
185 Eunike . . .	Jan. 0	10.3	10.4	7.0	1889 Aug. 29.0	1900.0	328 8 9.8	221 35 39.2
186 Celuta	April 25	11.6	11.4	8.9	1897 Aug. 27.0	1900.0	2 39 38.6	313 36 19.9
187 Lamberta . .	Jan. 13	11.4	11.4	8.0	1897 Aug. 27.0	1900.0	94 42 30.1	192 2 34.6
188 Menippe . . .	Febr. 18	13.5	13.0	9.6	1897 Sept. 1.0	1897.0	23 1 52.2	66 37 4.1
189 Phthia	Mai 21	12.2	11.5	8.8	1900 Mai 24.0	1900.0	234 17 27.2	166 0 35.8
190 Ismene . . .	Juli 29	12.7	12.0	6.7	1900 Juli 23.0	1900.0	212 25 24.5	286 18 31.4
191 Kolga	Jan. 30	12.1	12.0	8.3	1897 Juli 18.0	1900.0	271 52 28.4	224 21 6.3
192 Nausikaa . .	—	—	9.3	6.7	1888 Juli 25.0	1900.0	324 20 18.4	27 40 31.7
193 Ambrosia . .	April 7	12.9	12.2	9.2	1879 März 25.5	1890.0	68 48 35.8	79 36 57.9
194 Prokne . . .	März 10	11.5	10.5	7.4	1899 Jan. 29.0	1900.0	130 9 24.2	160 37 14.6
195 Eurykleia . .	Aug. 24	12.4	12.3	8.6	1896 Nov. 20.0	1900.0	289 6 35.6	118 6 40.4
196 Philomela . .	Jan. 11	10.5	10.3	6.3	1898 Nov. 10.0	1900.0	81 59 4.9	237 53 16.3
197 Arete	Jan. 10	13.3	12.7	9.3	1900 Jan. 24.0	1900.0	134 40 9.5	243 28 16.7
198 Ampella . . .	—	—	11.1	8.3	1901 Jan. 19.0	1900.0	145 38 12.0	87 26 9.6
199 Byblis	Jan. 18	13.1	12.4	8.2	1900 Jan. 4.0	1900.0	227 27 1.0	172 2 4.9
200 Dynamene . .	März 22	11.5	11.0	7.6	1889 Dec. 27.0	1900.0	30 58 9.6	82 42 28.9

Ω	i	φ	μ	Log. a	Autorität
° ′ ″	° ′ ″	° ′ ″	″		
18 40 42.3	9 3 13.4	7 57 23.4	967.0645	0.3763675	Tietjen.
38 8 9.9	6 5 2.6	10 31 5.3	676.5719	0.4797951	Tietjen.
160 11 30.1	4 46 53.0	11 1 5.2	976.7787	0.3734736	A. Berberich.
77 36 9.5	24 24 25.5	20 18 45.1	831.0764	0.4202438	Oberstl. Richter.
304 2 38.3	11 12 2.0	3 54 10.6	641.1299	0.4953737	Dr. Samter.
129 31 20.8	12 1 58.2	12 13 13.9	806.7683	0.4288385	Oberstl. Richter.
166 30 4.3	2 10 50.3	1 59 3.7	736.5954	0.4551851	H. Lange.
209 14 59.7	4 36 10.3	4 21 54.0	571.6864	0.5285658	Oberstl. v. d. Groeben.
354 49 46.7	5 30 46.5	7 31 33.7	979.6462	0.3726249	Oberstl. Richter.
301 23 29.8	14 21 59.6	3 44 28.8	869.2225	0.4072505	H. Lange.
100 57 12.2	2 33 13.5	6 38 28.6	636.3859	0.4975241	A. Berberich.
332 3 2.5	10 2 6.0	6 32 18.8	965.9899	0.3766893	A. Berberich.
148 44 52.2	14 15 41.1	11 51 44.6	780.8006	0.4383110	Dr. Becka.
328 40 0.4	12 6 28.6	8 23 43.8	734.0156	0.456201	H. Oppenheim.
25 23 51.1	3 10 40.0	11 7 48.8	612.3316	0.5086799	A. Berberich.
201 1 6.6	22 41 14.3	10 1 24.6	626.2924	0.5021529	Prof. P. Neugebauer.
349 25 24.5	1 26 50.6	13 32 58.0	768.8406	0.4427802	Oberstl. Richter.
50 56 17.2	1 54 30.3	2 28 36.0	918.5627	0.3912652	A. Berberich.
253 11 54.0	7 47 53.7	6 37 0.0	692.8578	0.472908	H. Oppenheim.
314 38 27.4	0 53 37.2	9 46 17.7	790.4612	0.4347501	Oberstl. v. d. Groeben.
144 59 6.3	18 35 27.7	12 40 26.5	643.5438	0.4942856	Dr. de Ball.
106 40 11.0	2 10 10.9	10 50 51.9	944.5132	0.3831990	Dr. Samter.
142 49 11.3	26 26 6.4	20 19 26.5	760.5455	0.4459209	Prof. Donner.
334 35 3.6	1 11 19.6	3 24 23.1	622.6844	0.5038304	Pfarrer Thraen.
153 54 58.7	23 14 23.2	7 11 6.0	782.8646	0.4375466	Oberstl. v. d. Groeben.
14 35 38.0	13 11 7.2	8 41 21.3	977.5884	0.3732337	Tietjen.
22 14 21.7	10 41 20.6	13 36 43.5	785.6152	0.4365311	Prof. A. Leman.
241 45 5.2	11 44 38.6	10 15 28.9	772.712	0.441326	J. Coniel.
203 23 22.8	5 8 58.3	2 4 18.4	924.2246	0.3894861	H. Oppenheim.
176 56 27.2	6 8 20.3	9 33 57.2	455.1028	0.5945981	Prof. Küstner.
159 50 50.8	11 29 30.2	5 13 5.0	720.0541	0.4617609	Prof. L. Becker.
343 24 55.7	6 51 36.0	14 9 22.7	952.4502	0.3807762	H. Lange.
351 23 45.9	11 38 37.1	16 34 52.0	858.2960	0.410913	Prof. A. Leman.
159 20 49.2	18 25 9.5	13 50 55.7	839.1447	0.4174465	Tietjen.
7 44 8.9	7 0 5.6	2 25 31.5	727.0472	0.4589627	Oberstl. v. d. Groeben.
73 20 8.1	7 16 57.8	1 10 59.6	645.2604	0.4935145	Tietjen.
82 2 18.3	8 49 20.6	9 22 12.5	782.6498	0.4376327	Oberstl. v. d. Groeben.
268 30 0.7	9 18 55.2	13 6 24.6	920.1134	0.3907768	Oberstl. v. d. Groeben.
89 43 9.9	15 25 3.2	10 17 26.5	629.4802	0.5006831	Tietjen.
325 26 20.0	6 54 42.4	7 42 34.1	783.2093	0.4374192	Oberstl. v. d. Groeben.

Nr. und Name	Opposition 1900	Gr.	m_0	g	Epoche und Osculation	Mittl. Aequ.	M	ω
201 Penelope . .	April 20	12.3	11.9	8.6	1897 Nov. 15.0	1900.0	53° 1′ 14.6″	177° 43′ 7.9″
202 Chryseïs . .	Aug. 9	11.2	10.7	6.7	1896 Nov. 20.0	1900.0	296 12 57.2	355 17 6.8
203 Pompeja . .	April 20	11.0	11.7	8.3	1899 Jan. 9.0	1900.0	65 39 8.5	53 45 40.9
204 Kallisto . . .	Juli 12	11.0	12.0	8.7	1888 Nov. 2.0	1900.0	140 55 19.4	51 16 43.4
205 Martha . . .	März 16	12.8	12.7	9.2	1886 Febr. 26.0	1900.0	139 40 10.2	172 8 57.2
206 Hersilia . . .	April 25	12.1	12.0	8.6	1887 Juni 21.0	1900.0	184 57 36.2	300 24 1.3
207 Hedda . . .	Dec. 5	11.5	11.8	9.5	1898 Febr. 3.0	1900.0	280 15 16.2	190 38 9.4
208 Lacrimosa. .	—	—	12.1	8.4	1899 Nov. 25.0	1900.0	315 23 43.1	105 47 29.6
209 Dido	Juli 3	11.3	11.6	7.5	1897 Dec. 25.0	1900.0	222 33 3.9	249 37 7.2
210 Isabella . . .	Mai 23	13.0	12.5	9.1	1897 Oct. 26.0	1900.0	358 48 23.3	10 17 7.0
211 Isolda	Nov. 5	10.6	11.5	7.5	1895 Nov. 26.0	1900.0	1 10 4.0	170 42 54.3
212 Medea	Nov. 21	11.5	12.2	8.1	1899 Juli 28.0	1900.0	276 2 57.4	101 16 47.5
213 Lilaea	Oct. 9	11.6	11.7	8.3	1898 Febr. 23.0	1900.0	229 20 37.9	158 34 56.7
214 Aschera . . .	—	—	12.1	9.0	1897 April 9.0	1900.0	71 25 59.3	128 5 59.2
215 Oenone . . .	Oct. 9	12.7	12.8	9.4	1891 Nov. 7.0	1890.0	55 44 10.3	314 3 11.3
216 Kleopatra . .	Juli 1	10.3	10.1	6.6	1886 Juni 26.0	1900.0	277 9 56.8	176 12 8.3
217 Eudora . . .	Nov. 28	13.3	13.1	9.5	1889 Mai 1.0	1900.0	296 55 48.4	150 23 31.7
218 Bianca . . .	Jan. 20	11.5	11.3	8.1	1889 Oct. 8.0	1900.0	134 31 18.9	59 2 8.1
219 Thusnelda .	Febr. 8	12.4	11.2	8.8	1889 Jan. 21.0	1900.0	130 33 20.7	140 3 56.2
220 Stephania . .	Dec. 21	13.8	13.6	11.0	1887 Jan. 0.5	1881.0	131 12 41.6	75 9 17.1
221 Eos	Sept. 10	10.6	11.2	7.3	1889 Juni 30.0	1900.0	322 54 24.2	187 21 38.9
222 Lucia	Juli 17	12.1	12.9	8.8	1898 Jan. 14.0	1900.0	225 34 56.4	175 50 37.7
223 Rosa	Juli 10	13.8	13.3	9.2	1891 Dec. 17.0	1900.0	333 11 14.5	58 36 24.6
224 Oceana . . .	Juli 13	11.4	11.7	8.5	1890 Febr. 5.0	1900.0	225 24 48.8	276 55 27.3
225 Henrietta . .	Febr. 18	13.7	12.7	8.2	1897 Dec. 5.0	1900.0	107 58 34.0	97 59 44.8
226 Weringia . .	Sept. 10	12.3	13.0	9.7	1891 Aug. 19.0	1900.0	30 52 14.2	150 8 35.2
227 Philosophia .	Nov. 1	13.8	12.9	8.7	1896 Dec. 10.0	1900.0	283 51 33.6	254 29 54.3
228 Agathe . . .	Jan. 6	15.3	14.5	12.4	1892 Nov. 21.5	1900.0	49 45 10.8	16 3 45.6
229 Adelinda . .	Juni 1	13.3	13.5	8.9	1900 Juni 13.0	1900.0	295 35 57.4	302 32 27.5
230 Athamantis .	Juli 5	10.3	10.3	7.7	1897 Oct. 26.0	1900.0	11 22 17.7	137 13 14.1
231 Vindobona .	Febr. 3	12.7	12.4	8.6	1898 Nov. 10.0	1900.0	164 53 38.2	263 38 47.9
232 Russia . . .	Juni 21	12.9	13.4	10.4	1898 Dec. 20.0	1900.0	278 44 40.1	48 16 14.3
233 Asterope . .	März 27	11.8	11.3	8.1	1897 Aug. 27.0	1900.0	353 18 46.2	122 36 1.0
234 Barbara . . .	Febr. 11	12.9	11.7	9.1	1898 Oct. 21.0	1900.0	33 57 10.0	190 6 49.6
235 Carolina . .	März 6	12.3	12.2	8.5	1897 Sept. 16.0	1900.0	73 32 29.3	207 24 1.2
236 Honoria . . .	Dec. 1	12.0	11.4	7.9	1890 Aug. 20.5	1900.0	341 11 56.1	170 30 28.5
237 Coelestina. .	Dec. 48	12.0	12.8	9.4	1897 März 20.0	1900.0	258 3 0.9	196 24 10.8
238 Hypatia . . .	Dec. 28	11.5	11.7	8.0	1899 Sept. 26.0	1900.0	327 11 49.3	207 5 36.7
239 Adrastea . .	Nov. 28	13.1	14.2	10.4	1892 Febr. 15.0	1900.0	128 25 5.1	205 14 35.1
240 Vanadis . .	Mai 2	13.5	12.5	9.3	1899 Febr. 18.0	1900.0	63 55 57.6	297 29 15.8

☊	i	φ	μ	Log. a	Autorität
° ′ ″	° ′ ″	° ′ ″	″		
157 9 13.8	5 43 19.3	10 25 29.0	809.8341	0.4277403	Oberstl. Richter.
137 46 20.6	8 49 30.7	5 51 45.4	659.4551	0.4872142	A. Berberich.
348 38 9.2	3 12 15.3	3 28 23.6	783.8637	0.4371774	A. Berberich.
205 53 55.1	8 17 7.5	9 51 34.4	812.2343	0.4268835	A. Palisa.
212 26 1.6	10 39 57.5	1 54 54.4	765.9190	0.4438825	Prof. Küstner.
145 25 45.0	3 45 29.5	2 19 59.5	782.3554	0.437735	Dr. Stechert.
28 58 10.3	3 48 59.9	1 39 3.3	1027.9888	0.3586788	Oberstl. Richter.
5 17 34.0	1 47 10.4	0 54 11.9	721.0639	0.4613553	A. Berberich.
2 0 10.2	7 14 28.1	3 46 48.0	636.9545	0.4972654	Oberstl. v. d. Groeben.
33 3 14.5	5 18 7.1	7 6 30.8	790.0977	0.4348838	A. Berberich.
265 19 9.6	3 52 0.4	9 15 38.7	668.6041	0.4832250	Oberstl. v. d. Groeben.
315 6 54.5	4 16 51.0	6 40 42.2	647.3973	0.4925571	Prof. L. Becker.
122 28 12.8	6 46 30.6	8 19 49.1	777.0010	0.4397237	Prof. A. Leman.
342 32 52.4	3 27 33.7	1 55 49.3	840.5265	0.4169701	Tietjen.
25 14 14.4	1 43 15.1	2 1 15.8	771.4078	0.4418151	Oberstl. v. d. Groeben.
216 0 17.8	13 2 25.9	14 31 20.7	759.7703	0.4462182	Prof. Knopf.
164 8 53.6	10 16 30.8	18 1 5.2	730.2884	0.4576747	Oberstl. Richter.
171 2 56.0	15 12 16.9	6 40 5.1	815.0438	0.4258837	Oberstl. v. d. Groeben.
200 56 29.1	10 47 21.0	12 54 38.9	982.2924	0.3718439	A. Darmer.
258 26 26.6	7 34 15.0	14 53 43.7	984.634	0.371154	Dr. Bidschof.
142 39 44.8	10 51 15.2	5 50 34.9	678.2597	0.4790737	Oberstl. v. d. Groeben.
80 22 0.5	2 10 46.6	8 27 39.8	641.7676	0.4950859	A. Berberich.
48 42 6.0	1 58 42.6	6 57 1.2	652.9374	0.4900900	Oberstl. v. d. Groeben.
353 31 34.5	5 52 23.2	2 25 51.0	824.6755	0.4224824	Dr. S. Oppenheim.
200 48 28.8	20 41 16.4	15 14 24.6	566.6635	0.531121	Dr. Cerulli.
135 30 54.5	15 49 34.2	11 43 4.3	793.2109	0.433745	Prof. H. Kreutz.
331 1 10.1	9 14 55.8	12 2 39.9	637.0300	0.4972311	H. Lange.
313 35 24.5	2 33 18.0	13 55 0.2	1086.2400	0.3427205	Prof. H. Kreutz.
30 51 0.6	2 9 20.9	8 16 3.0	560.7202	0.5341736	A. Berberich.
239 44 27.5	9 25 13.5	3 32 52.8	964.9093	0.3770134	Oberstl. Richter.
352 16 1.4	5 8 13.8	8 56 36.2	711.1049	0.4653820	H. Lange.
152 27 53.4	6 4 17.7	9 52 51.0	869.2983	0.4072251	Oberstl. v. d. Groeben.
222 31 21.5	7 39 7.6	5 49 43.8	817.9445	0.4248552	Prof. Knopf.
144 16 54.2	15 21 18.3	14 7 1.5	962.6609	0.3776889	Tietjen.
66 34 7.6	9 4 1.8	3 31 18.9	725.2712	0.4596708	Tietjen.
186 40 30.6	7 36 53.0	10 54 45.4	758.1024	0.446853	Dr. Bidschof.
84 36 28.9	9 45 48.8	4 1 30.3	771.8775	0.4416388	Dr. B. Schwarz.
184 22 9.7	12 23 32.5	5 9 26.4	716.0964	0.4633567	A. Berberich.
181 40 9.4	6 7 41.4	13 7 38.0	691.2906	0.4735639	A. Berberich.
114 57 18.1	2 5 50.1	12 6 26.6	816.6267	0.4253220	A. Berberich.

Nr. und Name	Opposition 1900	Gr.	m_0	g	Epoche und Osculation	Mittl. Aequ.	M	ω
241 Germania	Sept. 23	10.7	11.2	7.2	1900 Sept. 21.0	1900.0	14° 20′ 36.″0	73° 8′ 57.″2
242 Kriemhild	—	—	12.6	9.0	1889 Dec. 27.0	1900.0	307 49 54.4	274 28 30.0
243 Ida	—	—	13.3	9.7	1899 Nov. 25.0	1900.0	6 39 30.9	104 43 37.8
244 Sita	Nov. 14	13.0	13.7	11.7	1900 Nov. 20.0	1900.0	31 33 23.4	164 27 41.2
245 Vera	Nov. 27	11.5	12.5	8.5	1897 März 20.0	1900.0	141 1 15.6	326 19 24.6
246 Asporina	Oct. 14	12.0	11.7	8.4	1890 Jan. 16.0	1900.0	316 40 26.7	94 5 3.7
247 Eukrate	Juni 10	12.1	11.0	7.6	1900 Juni 13.0	1900.0	224 37 55.8	53 33 7.1
248 Lameia	März 9	12.9	13.0	10.2	1900 März 25.0	1900.0	293 0 27.6	2 20 6.9
249 Ilse	Nov. 10	12.5	13.6	11.1	1896 Sept. 1.0	1900.0	332 23 24.0	39 16 10.3
250 Bettina	Mai 11	12.2	11.7	7.6	1897 Nov. 15.0	1900.0	332 5 23.0	65 59 32.9
251 Sophia	Juni 15	14.2	13.6	9.6	1900 Juni 13.0	1900.0	177 35 1.4	287 26 13.7
252 Clementina	Mai 7	13.2	13.0	8.8	1899 Febr. 18.0	1900.0	162 38 19.3	149 8 56.6
253 Mathilde	Febr. 8	14.7	13.4	10.2	1898 Nov. 10.0	1900.0	55 7 48.0	153 43 45.8
254 Augusta	Oct. 30	13.9	13.4	11.3	1887 Juli 31.0	1900.0	101 27 54.0	230 48 36.7
255 Oppavia	Mai 29	13.7	13.8	10.4	1889 März 2.0	1900.0	267 18 9.8	149 8 2.5
256 Walpurga	—	—	13.2	9.3	1899 Nov. 5.0	1900.0	187 50 13.9	43 9 32.0
257 Silesia	Dec. 19	12.1	12.8	8.7	1898 Juni 3.0	1900.0	212 13 25.8	27 40 46.7
258 Tyche	Nov. 10	10.1	11.1	8.0	1899 Mai 29.0	1899.0	267 50 31.4	152 40 29.2
259 Aletheia	—	—	12.1	8.0	1898 Sept. 11.0	1900.0	85 40 51.4	156 12 30.0
260 Huberta	Dec. 10	13.9	13.9	9.2	1900 Dec. 10.0	1900.0	92 3 1.9	163 58 1.2
261 Prymno	Sept. 25	12.3	11.9	9.4	1897 Nov. 15.0	1900.0	275 46 18.1	63 6 35.9
262 Valda	März 13	14.3	14.1	11.1	1900 März 5.0	1900.0	82 47 25.5	22 31 35.1
263 Dresda	Aug. 9	13.0	13.3	9.6	1900 Aug. 12.0	1900.0	309 25 24.3	157 46 54.0
264 Libussa	Oct. 13	11.3	12.1	8.6	1894 Juni 4.0	1900.0	224 30 49.9	336 35 29.0
265 Anna	Oct. 30	15.3	13.8	11.1	1899 Aug. 17.0	1900.0	67 23 25.8	251 4 45.0
266 Aline	März 4	12.4	11.7	8.2	1900 März 5.0	1900.0	131 44 0.5	147 59 21.3
267 Tirza	Febr. 28	14.1	14.0	10.5	1898 Dec. 20.0	1900.0	167 41 8.3	193 39 22.8
268 Adorea	Nov. 4	13.1	12.5	8.5	1897 Febr. 28.0	1900.0	348 19 31.1	58 53 34.1
269 Justitia	Oct. 20	13.0	12.7	9.6	1900 Oct. 31.0	1900.0	91 35 3.3	115 30 59.1
270 Anahita	Oct. 5	10.2	11.0	8.9	1900 Sept. 21.0	1900.0	25 43 7.7	77 57 51.7
271 Penthesilea	März 8	13.5	12.8	8.9	1900 Febr. 13.0	1900.0	128 29 24.5	50 13 36.7
272 Antonia	Nov. 12	13.5	13.6	10.1	1899 Juli 28.0	1900.0	208 59 58.9	65 31 30.6
273 Atropos	Juli 29	10.7	11.6	9.0	1888 März 9.5	1900.0	261 20 1.8	118 28 18.0
274 Philagoria	Aug. 25	13.8	13.6	9.6	1899 Mai 29.0	1900.0	24 20 51.9	115 34 59.3
275 Sapientia	Dec. 8	11.8	12.0	8.5	1897 Febr. 28.0	1900.0	354 20 18.0	31 13 26.7
276 Adelheid	Juli 4	12.2	11.2	7.7	1899 Mai 9.0	1900.0	82 21 36.0	273 54 6.3
277 Elvira	Dec. 4	12.9	13.1	9.4	1899 Aug. 17.0	1900.0	320 39 21.3	132 55 51.4
278 Paulina	—	—	12.7	9.3	1899 Nov. 5.0	1900.0	218 13 40.4	135 31 8.8
279 Thule	Jan. 11	14.1	13.8	8.1	1891 Febr. 20.0	1900.0	155 36 48.8	233 20 26.5
280 Philia	Febr. 11	14.0	14.4	10.6	1900 Febr. 13.0	1900.0	39 45 20.2	80 58 14.5

☊	i	φ	μ	Log. a	Autorität
271° 58′ 58.6″	5° 30′ 43.9″	5° 26′ 42.5″	665.7416″	0.4844672	Dr. W. Luther.
208 7 41.0	11 16 55.9	7 5 15.3	732.9031	0.4566401	Dr. Herz.
326 2 47.5	1 9 18.5	2 42 32.2	733.0664	0.4565755	A. Berberich.
208 39 31.6	2 49 41.8	7 53 3.8	1106.6015	0.3373437	A. Berberich.
62 1 46.7	5 11 18.2	11 37 34.2	651.4943	0.4907307	Tietjen.
162 45 44.0	15 37 40.4	6 2 43.0	802.267	0.4304584	Seydler.
0 17 18.7	25 3 55.2	13 53 45.9	780.9440	0.4382578	Dr. W. Luther.
246 38 32.5	4 0 59.9	3 42 45.7	913.9068	0.3927365	A. Berberich.
334 49 10.0	9 41 8.0	12 28 25.6	967.8662	0.3761275	A. Berberich.
25 37 2.6	12 56 21.1	7 1 48.1	633.7875	0.4987086	Dr. Mönnichmeyer.
156 54 32.8	10 28 30.6	5 31 47.2	648.5081	0.4920608	Prof. Knopf.
203 14 23.2	10 1 12.8	4 27 58.2	633.3155	0.4989244	A. Charlois.
180 1 26.7	6 38 17.9	15 26 37.5	824.4270	0.4225696	Prof. Knopf.
28 20 51.6	4 31 59.3	6 58 7.6	1091.0836	0.3414323	Dr. B. Schwarz.
14 13 57.4	9 30 38.6	4 40 24.1	780.0705	0.4385818	Dr. Laves.
183 38 24.5	13 18 0.2	3 29 45.6	682.1748	0.4774073	A. Berberich.
35 25 53.6	3 40 7.7	7 4 44.5	646.3454	0.4930280	A. Berberich.
207 44 4.1	14 14 46.5	11 48 8.5	838.4573	0.4176838	Dr. Stechert.
88 30 20.5	10 42 50.0	6 20 21.0	635.7631	0.4978075	Tietjen.
167 55 34.1	6 17 58.0	7 7 16.5	554.7196	0.5372887	Oberstl. v. d. Groeben.
96 20 56.7	3 38 28.8	5 9 55.6	996.7804	0.367605	Oberstl. v. d. Groeben.
38 37 9.4	7 44 20.6	12 17 17.5	870.5130	0.4068209	A. Berberich.
217 38 21.7	1 16 57.4	4 19 24.9	723.1695	0.4605110	Oberstl. v. d. Groeben.
50 4 47.6	10 26 47.9	7 45 36.5	757.4897	0.447087	Dr. Cerulli.
335 24 48.6	25 43 0.0	15 12 47.2	941.4296	0.384146	A. Berberich.
236 26 12.2	13 22 8.3	9 9 53.6	756.4554	0.4474822	A. Berberich.
74 3 30.8	6 1 29.1	5 43 23.8	767.9409	0.4431192	Oberstl. v. d. Groeben.
121 47 20.9	2 25 23.5	7 54 36.0	652.1602	0.4904349	A. Berberich.
157 29 1.3	5 25 53.7	12 18 39.7	838.9442	0.4175157	A. Berberich.
254 31 28.8	2 21 39.6	8 37 15.6	1089.0147	0.3419819	A. Berberich.
337 5 18.0	3 34 39.1	5 56 35.1	681.3226	0.4777693	Prof. Knopf.
37 43 34.9	4 28 27.5	1 46 56.3	767.2554	0.4433777	A. Charlois.
158 58 44.0	20 24 5.4	9 19 0.4	955.4037	0.379880	H. Lange.
93 42 12.5	3 40 47.1	7 14 43.7	668.8847	0.4831036	A. Berberich.
134 48 56.3	4 44 50.5	9 30 47.4	769.4963	0.4425334	H. Lange.
211 31 43.1	21 36 23.1	3 55 49.0	644.0120	0.4940751	J. Hackenberg.
233 10 35.6	1 7 49.4	5 6 55.0	723.9561	0.4601962	A. Berberich.
62 31 11.4	7 49 10.4	7 35 40.4	775.5978	0.4402467	A. Berberich.
75 32 38.2	2 22 34.9	4 43 14.2	403.1860	0.629667	Dr. Bidschof.
11 17 5.6	7 27 26.0	6 19 13.9	703.8816	0.4683380	A. Berberich.

Nr. und Name	Opposition 1900	Gr.	m_0	g	Epoche und Osculation	Mittl. Aequ.	M	ω
281 Lucretia . .	Mai 21	14.3	13.6	11.5	1888 Nov. 2.5	1900.0	353° 48′ 12.″3	14° 13′ 10.″2
282 Clorinde . .	März 22	13.3	13.3	10.8	1900 März 5.0	1900.0	87 21 19.9	293 35 41.5
283 Emma	März 4	12.5	11.8	7.8	1900 März 5.0	1900.0	167 25 20.3	50 3 45.9
284 Amalia . . .	Juni 3	11.6	12.9	10.4	1900 Mai 24.0	1900.0	333 47 12.4	55 29 57.2
285 Regina . . .	Sept. 11	13.8	14.9	10.9	1889 Aug. 19.5	1900.0	357 36 27.2	12 29 9.3
286 Iclea	Juli 17	13.2	13.2	9.0	1900 Juli 23.0	1900.0	271 4 52.2	237 3 57.8
287 Nephthys . .	Sept. 21	10.7	10.7	8.2	1899 April 19.0	1900.0	311 52 37.9	117 32 24.2
288 Glauke . . .	Juli 6	12.1	12.5	9.1	1900 Juli 3.0	1900.0	59 1 1.6	80 41 34.8
289 Nenetta . . .	März 4	13.4	12.5	8.8	1900 März 5.0	1900.0	146 2 33.0	185 33 23.0
290 Bruna	—	—	13.9	11.5	1890 Mai 7.5	1900.0	56 49 22.1	103 32 37.8
291 Alice	Mai 7	13.6	13.6	11.4	1900 Mai 24.0	1900.0	89 46 41.2	329 57 9.3
292 Ludovica . .	Dec. 26	12.6	12.5	9.5	1899 Sept. 26.0	1900.0	10 5 58.6	287 46 46.4
293 Brasilia . . .	Juni 21	13.2	12.9	9.2	1890 Juni 17.5	1900.0	92 28 41.4	82 22 8.5
294 Felicia . . .	April 8	14.7	14.3	10.2	1890 Oct. 2.5	1900.0	8 44 31.0	180 17 29.4
295 Theresia . .	Dec. 4	12.5	13.5	10.0	1899 Juli 8.0	1900.0	259 17 15.9	143 32 34.3
296 Phaëtusa . .	Sept. 3	12.3	13.3	11.1	1890 Aug. 22.0	1900.0	330 33 11.7	250 2 1.2
297 Caecilia . . .	April 20	13.4	13.3	9.1	1900 April 14.0	1900.0	267 49 8.0	346 43 33.8
298 Baptistina .	Sept. 3	14.1	13.5	11.3	1900 Sept. 1.0	1900.0	202 6 1.5	132 23 30.7
299 Thora	April 21	14.7	14.5	11.7	1892 März 6.0	1900.0	131 22 30.1	148 18 8.5
300 Geraldina . .	Mai 23	13.8	13.9	9.6	1895 Juli 9.0	1900.0	336 44 54.3	282 58 45.2
301 Bavaria . . .	—	—	12.2	8.8	1901 Jan. 19.0	1900.0	236 31 41.8	121 18 58.6
302 Clarissa . . .	Mai 3	14.4	13.9	11.2	1897 Febr. 8.0	1900.0	208 29 34.2	52 13 39.2
303 Josephina . .	Nov. 12	11.7	12.0	7.9	1899 Sept. 6.5	1900.0	277 45 55.3	72 48 29.6
304 Olga	Nov. 2	11.6	12.4	9.7	1900 Sept. 21.0	1900.0	34 56 26.5	169 48 6.2
305 Gordonia . .	Oct. 27	11.8	12.5	8.4	1899 Juli 28.0	1900.0	230 21 59.4	251 10 4.4
306 Unitas . . .	Dec. 9	11.2	10.7	8.2	1899 Juni 18.5	1900.0	328 21 57.6	165 19 10.9
307 Nike	—	—	13.1	9.4	1891 März 8.5	1900.0	74 34 39.6	320 15 5.6
308 Polyxo . . .	März 15	11.1	11.0	7.6	1900 März 25.0	1900.0	247 50 38.3	111 14 1.5
309 Fraternitas .	Mai 20	12.6	12.7	9.5	1891 Mai 11.5	1900.0	239 5 58.0	332 8 11.1
310 Margarita . .	Mai 6	12.9	13.5	10.1	1891 Juni 17.5	1900.0	48 49 25.4	320 42 21.0
311 Claudia . . .	März 24	13.0	13.0	9.3	1895 März 11.0	1900.0	37 0 15.1	54 55 29.3
312 Pierretta . .	Aug. 29	12.0	12.5	9.0	1891 Aug. 29.0	1900.0	74 55 14.0	257 42 14.4
313 Chaldaea . .	—	—	10.3	7.7	1899 Nov. 25.0	1900.0	314 36 54.4	313 8 8.8
314 Rosalia . . .	März 28	14.9	14.0	9.9	1891 Dec. 3.5	1900.0	17 47 52.5	185 35 52.8
315 Constantia .	März 9	14.9	14.0	11.8	1891 Sept. 4.5	1900.0	9 27 44.6	171 22 17.8
316 Goberta . . .	April 10	13.7	13.3	9.1	1893 Jan. 0.0	1900.0	11 29 4.9	307 28 10.6
317 Roxane . . .	Febr. 1	12.6	12.2	9.8	1900 Jan. 24.0	1900.0	150 27 59.6	185 18 24.6
318 Magdalena .	Febr. 22	13.2	13.2	9.0	1899 Jan. 9.0	1900.0	0 5 58.5	273 32 45.8
319 Leona	März 9	14.7	14.2	9.7	1900 März 25.0	1900.0	105 27 18.9	216 18 9.9
320 Katharina . .	Mai 20	14.5	14.2	10.3	1891 Dec. 2.5	1900.0	23 36 28.6	142 54 36.1

☊	i	φ	μ	Log. a	Autorität
° ′ ″	° ′ ″	° ′ ″	″		
31 10 9.0	5 19 33.9	7 34 24.3	1098.5312	0.3394628	A. Berberich.
144 43 50.7	9 1 3.3	4 38 46.0	991.8748	0.3690332	A. Berberich.
305 43 7.4	8 2 27.2	8 46 54.2	668.98929	0.483058	A. Berberich.
233 55 40.9	8 4 0.3	12 48 19.0	979.2047	0.372755	A. Berberich.
312 10 29.6	17 16 54.4	11 55 35.4	661.4827	0.4863254	A. Charlois.
149 32 8.6	17 53 41.6	0 42 53.1	621.2989	0.5044707	A. Berberich.
142 5 45.7	10 1 24.1	1 19 35.4	982.6631	0.371735	Dr. Cerulli.
120 58 22.3	4 19 56.4	11 56 58.4	774.1972	0.440770	Prof. R. Luther.
182 36 11.3	6 39 25.5	11 54 3.1	729.0809	0.4581539	A. Berberich.
10 27 0.1	22 13 23.6	15 4 22.7	995.1925	0.368066	Dr. S. Oppenheim.
161 3 13.6	1 50 34.8	5 19 10.3	1070.8481	0.346853	A. Berberich.
43 5 37.7	14 52 13.9	1 36 45.3	881.3701	0.4032322	A. Berberich.
62 12 47.0	15 45 19.2	6 48 2.9	730.8370	0.4574574	A. Charlois.
137 1 48.4	6 14 56.2	14 30 22.2	639.9696	0.4958982	A. Charlois.
277 30 38.9	2 40 28.1	9 48 43.7	759.2235	0.4464247	Dr. S. Oppenheim.
120 55 34.0	1 44 50.1	9 6 25.9	1068.122	0.3475906	J. Coniel.
333 37 5.5	7 34 33.6	8 9 7.6	629.7170	0.500574	A. Berberich.
8 0 22.3	6 17 46.6	5 33 40.8	1042.0276	0.3547517	A. Berberich.
241 49 46.6	1 35 18.9	3 29 56.6	934.3006	0.386346	A. Berberich.
42 17 25.3	0 47 2.3	2 26 41.4	617.2655	0.5063564	Rodin.
142 29 30.2	4 52 39.8	3 36 13.7	788.5213	0.4354621	A. Berberich.
7 53 16.2	3 26 12.4	6 26 28.4	950.0992	0.3814918	A. Berberich.
345 15 23.8	6 54 51.5	3 53 41.6	643.8778	0.4941354	Prof. Millosevich.
158 47 27.9	15 47 19.6	12 47 10.7	952.3591	0.3808039	A. Berberich.
211 2 16.5	4 25 1.1	11 31 48.8	654.5373	0.4893815	A. Berberich.
141 36 20.8	7 15 13.3	8 39 29.5	980.0268	0.3725126	Prof. Millosevich.
101 39 16.0	6 6 55.5	8 22 32.2	716.1102	0.4633512	A. Capon.
182 7 55.3	4 19 45.4	2 15 25.9	778.5073	0.4391627	A. Berberich.
357 59 42.1	3 56 13.6	5 1 56.0	831.679	0.420034	A. Berberich.
230 33 51.3	3 5 57.8	6 31 55.2	775.6563	0.440225	A. Berberich.
81 7 5.7	3 15 57.0	0 43 21.9	720.425	0.461612	A. Berberich.
7 35 14.0	9 5 36.4	9 9 55.4	764.051	0.444589	Masson.
176 41 44.6	11 35 10.6	10 21 51.6	968.4446	0.3759545	A. Berberich.
171 21 31.7	12 33 36.4	10 48 58.3	635.8075	0.497787	A. Berberich.
161 14 14.6	2 24 35.4	9 40 17.9	1057.2646	0.3505486	Prof. Bohlin.
124 32 14.0	2 18 36.5	7 57 58.6	627.7382	0.501585	A. Berberich.
150 45 22.0	1 45 18.9	4 53 26.2	1026.4017	0.3591262	A. Berberich.
162 52 3.9	10 31 43.4	3 58 52.5	618.1074	0.505962	H. Mader.
189 4 8.2	10 45 52.6	12 13 59.5	566.8381	0.5310317	A. Berberich.
221 3 52.6	9 19 19.2	6 41 30.5	678.726	0.478875	A. Berberich.

Nr. und Name	Opposition 1900	Gr.	m_0	g	Epoche und Osculation	Mittl. Aequ.	M	ω
321 Florentina .	Aug. 10	13.3	13.2	9.5	1900 Aug. 12.0	1900.0	248° 16′ 46.3″	33° 19′ 27.1″
322 Phaeo	Sept. 29	11.1	12.3	8.8	1900 Oct. 31.0	1900.0	9 14 56.4	110 55 48.0
323 Brucia . . .	—	—	13.0	11.0	1892 Jan. 1.5	1891.0	43 0 42	292 17 48
324 Bamberga .	—	—	9.9	6.6	1899 Dec. 35.0	1900.0	43 12 35.7	40 24 34.4
325 Heidelberga	Juli 21	12.7	12.4	8.1	1900 Juli 23.0	1900.0	253 58 50.1	74 13 0.2
326 Tamara . . .	Oct. 19	11.5	11.1	8.7	1892 März 20.0	1900.0	298 49 14.0	236 57 27.0
327 Columbia . .	—	—	13.0	9.5	1892 Juni 17.5	1900.0	277 51 46.7	301 24 49.3
328 Gudrun . . .	Sept. 11	12.4	12.3	8.2	1892 März 22.5	1900.0	68 47 1.5	102 54 10.3
329 Svea	April 24	11.4	12.1	9.3	1900 April 14.0	1900.0	351 50 59.3	39 59 14.8
330 Adalberta .	—	—	13.5	11.7	1892 März 20.5	1892.0	181 3 42	0 0 0
331 Etheridgea .	Dec. 40	12.6	12.5	8.5	1899 Oct. 16.0	1900.0	14 52 12.8	334 14 59.9
332 Siri	—	—	12.6	9.1	1898 Aug. 22.0	1900.0	352 29 7.1	295 45 59.7
333 Badenia . .	Febr. 1	13.1	12.7	8.6	1900 März 5.0	1900.0	108 25 4.7	15 17 28.3
334 Chicago . . .	Sept. 22	12.0	12.0	6.8	1897 März 11.5	1900.0	185 10 37.3	234 36 57.3
335 Roberta . . .	Oct. 20	11.6	11.6	8.8	1900 Oct. 31.0	1900.0	79 15 59.4	140 34 48.0
336 Lacadiera . .	—	—	11.8	9.6	1899 Sept. 26.0	1900.0	118 20 35.1	28 45 30.6
337 Devosa . . .	—	—	11.4	8.8	1897 Jan. 4.5	1900.0	351 48 50.4	95 58 57.2
338 Budrosa . .	April 4	12.2	12.1	8.4	1899 Jan. 9.0	1900.0	72 15 37.1	106 31 43.7
339 Dorothea . .	Febr. 19	13.2	12.8	8.8	1900 März 5.0	1900.0	182 47 13.6	156 42 43.3
340 Eduarda . .	Juni 13	13.5	12.9	9.5	1895 Jan. 10.0	1900.0	132 50 1.5	38 29 3.4
341 California . .	—	—	13.1	11.0	1893 Juni 29.0	1900.0	113 13 39.3	291 46 52.3
342 Endymion .	Sept. 27	12.7	12.8	9.8	1896 Oct. 11.0	1900.0	298 5 33.0	222 41 15.3
343 Ostara . . .	—	—	13.5	10.9	1899 Aug. 17.0	1900.0	297 5 28.6	7 15 18.9
344 Desiderata .	Sept. 26	10.6	11.7	8.5	1900 Sept. 21.0	1900.0	40 22 44.1	233 23 40.5
345 Tercidina . .	—	—	11.2	8.8	1899 Nov. 5.0	1900.0	319 52 4.6	227 52 36.6
346 Hermentaria	Juni 13	11.7	11.5	8.0	1899 März 1.0	1900.0	156 0 38.3	287 6 20.3
347 Pariana . . .	Oct. 19	12.7	12.0	8.8	1899 Juli 8.5	1900.0	114 13 11.1	83 20 9.8
348 May	Mai 22	13.3	12.9	9.1	1893 Jan. 16.5	1900.0	342 45 57.1	2 27 58.8
349 Dembowska	Mai 16	10.1	9.8	6.0	1895 Mai 10.0	1900.0	229 5 49.2	340 37 27.8
350 Ornamenta .	April 26	13.4	12.7	8.6	1900 April 14.0	1900.0	130 20 41.9	330 24 23.6
351 Yrsa	Aug. 27	12.9	12.2	8.8	1892 Dec. 20.5	1900.0	330 42 48.8	28 8 55.8
352 Gisela . . .	März 25	12.8	12.1	10.0	1898 Febr. 3.0	1900.0	272 5 26.1	142 22 3.0
353 [1893 *F*] . .	Aug. 1	14.4	14.2	10.9	1893 Febr. 22.5	1900.0	44 13 13.5	318 29 18.5
354 Eleonora . .	Sept. 13	10.6	10.0	6.5	1894 Mai 14.5	1900.0	81 5 20.5	4 47 2.1
355 Gabriella . .	Dec. 40	12.5	13.1	10.1	1893 Febr. 23.5	1900.0	37 15 11.6	94 32 57.3
356 [1893 *G*] . .	Aug. 9	12.2	11.9	8.5	1900 Aug. 12.0	1900.0	271 36 54.7	74 39 1.9
357 [1893 *J*] . .	Juni 7	12.5	12.2	8.0	1893 Febr. 15.5	1900.0	138 27 1.7	231 51 54.9
358 [1893 *K*] . .	Aug. 11	12.5	12.5	8.8	1893 März 3.5	1893.0	86 52 43.5	248 18 54.5
359 [1893 *M*] . .	—	—	13	9.5	1893 März 17.5	1893.0	163 43 16	0 0 0
360 [1893 *N*] . .	Juli 6	12.4	11.9	8.0	1893 März 12.5	1900.0	92 54 10.8	284 2 41.3

☊	i	φ	μ	Log. a	Autorität
40° 41′ 17.9″	2° 37′ 35.1″	2° 39′ 26.5″	723.7382″	0.460283	A. Berberich.
253 43 2.1	7 58 48.8	14 19 32.5	764.6297	0.4443703	A. Berberich.
97 2 30	19 20 54	15 57 36	1119.60	0.333960	A. Berberich.
329 0 17.5	11 18 15.1	19 45 58.0	807.7841	0.4284742	A. Berberich.
345 16 17.6	8 33 32.5	9 3 0.6	616.8237	0.5065637	A. Berberich.
32 0 53.7	23 47 18.7	10 48 17.5	1005.7638	0.365007	Dr. Bidschof.
355 31 43.7	7 9 8.5	3 41 7.4	765.613	0.443998	A. Berberich.
353 13 38.9	16 8 12.3	6 53 58.6	647.507	0.492508	A. Berberich.
178 23 29.0	16 0 42.9	1 34 24.1	911.3780	0.3935387	Dr. Pannekoek.
358 46 36	19 58 36	0 0 0	1174.9	0.32000	A. Berberich.
22 55 36.2	6 7 25.5	5 46 58.8	673.3904	0.4811597	A. Berberich.
31 57 59.1	2 52 33.8	5 8 46.8	768.4746	0.4429180	A. Berberich.
355 16 29.8	3 50 30.2	10 8 47.8	645.0495	0.4936090	A. Berberich.
134 18 23.6	4 38 4.5	0 50 24.0	459.742	0.591661	A. Berberich.
147 53 19.4	5 5 53.8	10 15 32.7	911.5556	0.3934823	A. Berberich.
234 53 49.4	5 38 39.2	5 26 36.6	1050.0039	0.3525438	A. Berberich.
355 33 55.4	7 52 0.4	7 54 54.5	964.527	0.377127	J. Coniel.
288 30 53.0	6 2 39.2	1 12 38.1	713.531	0.464396	J. Coniel.
174 24 21.7	9 53 36.5	5 56 55.6	680.5669	0.4780905	A. Berberich.
27 38 26.9	4 42 32.8	6 53 2.5	778.0224	0.439343	A. Berberich.
29 0 31.4	5 40 11.8	11 8 58.9	1088.2433	0.3421871	A. Berberich.
232 56 58.9	7 20 1.1	7 20 44.1	861.7771	0.4097412	A. Berberich.
38 37 14.6	3 18 12.6	13 26 8.3	948.2347	0.3820605	A. Berberich.
49 1 18.1	18 38 44.6	18 8 53.1	847.9673	0.4144183	A. Berberich.
212 29 44.2	9 44 18.3	3 33 5.7	1000.5696	0.3665062	Dr. Viaro.
92 24 14.7	8 45 21.8	5 47 46.6	758.5325	0.446688	V. Ehrenfeucht.
85 57 52.6	11 42 20.2	9 34 55.9	840.8521	0.416858	Dr. Boccardi.
90 40 1.9	9 44 17.4	3 45 27.2	695.387	0.471854	M. Ebell.
33 3 23.2	8 16 38.5	5 9 33.0	709.497	0.466038	Dr. F. Ristenpart.
90 40 2.6	24 48 34.0	9 4 16.8	645.8891	0.4932324	A. Berberich.
99 40 8.4	9 13 3.4	8 45 46.5	771.582	0.441750	A. Berberich.
247 8 14.8	3 21 55.4	8 33 45.0	1091.4985	0.3413223	A. Berberich.
103 6 14.2	5 32 21.7	18 49 43.3	794.611	0.433234	A. Berberich.
140 42 25.8	18 22 13.8	6 31 10.4	757.5785	0.4470526	Dr. Ciscato.
352 11 27.9	4 21 1.7	6 12 55.9	876.580	0.404810	A. Berberich.
356 9 12.1	8 16 0.3	13 57 5.4	775.7399	0.4401937	A. Berberich.
138 15 44.7	14 5 32.7	1 31 16.0	632.836	0.499142	J. Coniel.
172 54 2.8	3 31 52.7	8 26 24.1	725.563	0.459554	J. Coniel.
10 27 16	4 59 38	0 0 0	760.70	0.44586	A. Berberich.
133 42 48.4	11 38 10.1	9 43 35.9	681.803	0.477565	J. Coniel.

Nr. und Name	Opposition		m_0	g	Epoche und Osculation	Mittl. Aequ.	M	ω
	1900	Gr.					° ′ ″	° ′ ″
361 [1893 *P*] . .	Jan. 3	12.2	13.3	8.0	1893 März 12.5	1900.0	53 40 44.9	75 12 0.9
362 [1893 *R*] . .	—	—	11.1	8.0	1898 Aug. 22.0	1900.0	228 31 14.1	31 25 20.3
363 [1893 *S*] . .	Nov. 17	11.4	11.6	8.2	1899 Juli 8.0	1900.0	302 30 49.4	293 13 59.4
364 [1893 *T*] . .	Mai 3	12.5	11.7	9.5	1897 Juni 8.0	1900.0	203 39 20.5	310 52 58.4
365 [1893 *V*] . .	Oct. 31	11.3	12.2	8.7	1899 Aug. 17.0	1900.0	268 1 48.6	209 44 57.1
366 Vincentina .	Aug. 5	12.1	12.3	8.2	1900 Aug. 12.5	1900.0	8 31 40.2	314 10 53.6
367 [1893 *AA*] .	Juli 16	12.9	12.5	10.3	1897 Aug. 27.0	1900.0	198 37 34.8	53 14 54.2
368 [1893 *AB*] .	Dec. 6	13.8	13.5	9.5	1893 Juli 17.5	1900.0	317 18 49.4	85 7 25.1
369 Aëria	Jan. 17	12.9	12.9	9.5	1899 März 10.0	1900.0	34 2 38.3	267 3 40.6
370 [1893 *AC*] .	Juli 14	12.5	12.8	10.4	1893 Juli 14.5	1900.0	312 26 36.5	66 22 41.0
371 [1893 *AD*] .	—	—	11.8	8.4	1899 Dec. 15.0	1900.0	182 59 26.0	339 42 9.7
372 [1893 *AH*] .	—	—	10.5	6.4	1899 Sept. 26.0	1900.0	322 8 11.8	113 43 37.1
373 [1893 *AJ*] .	—	—	12.8	8.7	1899 April 20.0	1900.0	8 16 34.1	348 38 11.2
374 [1893 *AK*] .	Jan. 18	11.9	11.7	8.2	1896 Sept. 1.0	1900.0	342 39 36.2	22 57 48.9
375 [1893 *AL*] .	—	—	11.0	6.9	1897 Mai 19.0	1900.0	276 40 52.5	344 33 41.9
376 [1893 *AM*] .	Oct. 9	12.2	11.8	9.4	1899 März 10.0	1900.0	299 55 37.2	313 51 58.1
377 [1893 *AN*] .	April 4	13.0	11.5	8.2	1893 Oct. 7.5	1900.0	338 6 43.1	192 39 58.3
378 [1893 *AP*] .	April 4	13.2	12.6	9.1	1900 April 14.0	1900.0	168 50 19.7	152 58 17.3
379 [1894 *AQ*] .	Febr. 5	13.4	12.6	8.5	1894 Jan. 12.5	1900.0	98 29 53.4	177 57 18.6
380 [1894 *AR*] .	Juni 6	12.3	12.6	9.3	1894 Jan. 11.0	1900.0	129 17 7.6	237 32 11.9
381 [1894 *AS*] .	Febr. 9	12.6	12.4	8.1	1900 Jan. 24.0	1900.0	238 54 53.5	144 49 15.0
382 [1894 *AT*] .	März 14	11.4	12.1	8.1	1898 Dec. 20.0	1900.0	244 45 7.1	268 19 13.1
383 [1894 *AU*] .	März 7	13.6	13.3	9.2	1900 März 25.0	1900.0	103 4 8.0	314 15 4.4
384 Burdigala . .	Juli 17	12.3	11.7	8.5	1899 April 9.5	1900.0	119 46 59.6	30 33 4.5
385 Ilmatar . . .	Juli 23	10.7	10.3	6.7	1897 Dec. 25.5	1900.0	281 17 34.4	185 13 17.5
386 [1894 *AY*] .	Mai 19	10.9	10.5	6.8	1900 Mai 24.0	1900.0	223 23 19.9	216 42 1.3
387 Aquitania .	Sept. 21	9.1	9.8	6.4	1895 Juli 3.5	1900.0	353 6 10.2	153 33 24.0
388 [1894 *BA*] .	April 30	11.8	11.7	7.8	1894 Mai 6.5	1900.0	200 48 45.6	336 54 54.3
389 [1894 *BB*] .	Sept. 16	11.5	11.1	8.0	1899 Juni 18.0	1900.0	63 27 27.4	262 50 47.8
390 [1894 *BC*] .	Aug. 13	13.9	13.5	10.0	1899 Mai 17.0	1900.0	88 15 19.6	188 31 26.0
391 Ingeborg . .	April 6	14.8	13.4	11.0	1894 Nov. 6.0	1900.0	23 31 40.5	145 19 2.0
392 Wilhelmina .	Dec. 45	12.8	12.2	8.3	1894 Nov. 4.5	1900.0	42 10 20.6	134 52 8.1
393 [1894 *BG*] .	—	—	11.0	7.6	1894 Nov. 4.5	1900.0	67 32 29.0	85 38 13.6
394 [1894 *BH*] .	—	—	13.0	9.6	1894 Nov. 23.5	1900.0	55 25 12.3	265 37 56.0
395 [1894 *BK*] .	—	—	13.0	9.5	1894 Dec. 3.5	1900.0	136 43 41.3	20 40 2.1
396 [1894 *BL*] .	Jan. 5	14.0	13.2	9.7	1894 Dec. 2.5	1900.0	156 42 32.8	18 38 52.5
397 [1894 *BM*] .	Febr. 15	13.1	12.6	9.4	1897 Mai 19.0	1900.0	256 0 43.9	136 32 59.9
398 [1894 *BN*] .	—	—	12.0	8.1	1895 Jan. 22.5	1895.0	187 25 12	0 0 0
399 [1895 *BP*] .	Febr. 1	12.7	13.0	9.0	1895 März 1.5	1900.0	353 57 41.1	180 49 13.1
400 [1895 *BU*] .	Jan. 23	14.4	14.5	10.4	1895 März 18.5	1900.0	337 44 19.1	229 27 23.7

Ω	i	φ	μ	Log. a	Autorität
19° 32′ 14.5″	12° 36′ 54.9″	11° 47′ 42.4″	449.924″	0.597911	J. Coniel.
27 19 13.3	8 4 50.4	2 44 25.7	857.2968	0.411250	A. Berberich.
65 0 55.0	5 58 3.1	4 1 11.6	779.324	0.438859	A. Antoniazzi.
105 12 54.4	6 0 1.3	8 43 13.7	1072.6673	0.346361	A. Berberich.
185 46 27.4	12 43 30.8	8 19 48.5	756.0685	0.4476303	A. Berberich.
347 51 40.5	10 35 27.6	3 29 35.4	636.6377	0.497409	Dr. Boccardi.
83 1 45.5	2 56 49.2	5 24 23.5	1073.2216	0.346211	A. Berberich.
229 58 56.3	7 48 15.5	11 8 13.1	663.984	0.485231	A. Berberich.
94 26 5.2	12 43 42.6	5 36 57.7	824.0037	0.4227183	A. Berberich.
290 59 45.3	7 51 37.9	5 10 55.7	1001.5535	0.366222	A. Berberich.
284 8 25.4	7 23 6.7	3 28 34.2	787.7337	0.435752	H. Mader.
328 20 5.8	23 40 19.0	15 37 54.9	636.6860	0.497388	A. Berberich.
4 26 38.7	15 27 41.9	8 23 2.8	644.9956	0.4936333	A. Berberich.
219 36 41.2	8 57 57.6	4 27 27.6	765.4424	0.444063	A. Berberich.
337 20 28.1	15 57 20.2	5 37 56.4	641.2112	0.496004	K. Heuer.
302 12 53.2	5 25 18.9	9 51 15.3	1024.4027	0.3596906	A. Berberich.
210 36 8.4	6 39 41.6	4 26 14.5	804.920	0.429503	J. Coniel.
233 13 27.8	6 58 38.7	7 30 14.0	767.2482	0.4433805	A. Berberich.
172 44 58.5	1 36 33.6	11 3 4.0	641.338	0.495280	J. Coniel.
95 15 45.3	6 10 28.7	6 37 54.9	809.990	0.427685	A. Capon.
125 19 21.4	12 34 54.3	7 6 18.4	619.6807	0.5052257	A. Berberich.
315 44 53.0	7 25 38.3	9 52 38.6	646.1972	0.4930944	A. Berberich.
93 25 26.2	2 39 30.9	10 19 59.5	642.0203	0.4949719	A. Berberich.
48 13 27.0	5 38 54.5	8 22 34.3	820.6462	0.423900	F. Kromm.
344 55 49.1	13 42 55.9	7 30 32.1	740.0320	0.453837	G. Witt.
167 9 40.3	20 14 59.8	9 35 59.2	718.3236	0.462458	A. Berberich.
128 37 56.0	17 57 55.2	13 47 16.3	782.6076	0.4376414	J. H. Ogburn.
355 30 6.8	6 31 48.5	3 42 53.8	684.531	0.476409	A. Berberich.
282 37 51.2	8 7 7.3	3 53 14.7	842.4772	0.416299	D. Peyra.
305 25 32.1	12 8 52.8	7 28 40.3	821.022	0.423768	J. Coniel.
212 40 47.3	23 3 3.0	17 57 30.4	1003.286	0.365721	J. Coniel.
212 8 0.9	16 11 33.5	11 12 8.1	683.267	0.476944	A. Berberich.
215 1 40.2	14 52 29.3	19 13 37.7	768.335	0.442971	A. Berberich.
68 13 29.4	6 15 38.1	13 11 32.3	771.095	0.441933	J. Coniel.
259 52 27.5	3 31 42.3	7 16 9.6	764.391	0.444461	A. Capon.
251 17 22.6	2 37 51.3	10 18 30.4	782.986	0.437501	J. Coniel.
228 36 42.4	12 43 56.7	14 23 4.1	830.1664	0.420560	H. Mader.
284 14 19	20 9 57	0 0 0	684.68	0.47634	A. Charlois.
347 22 58.7	13 8 20.1	3 51 5.6	664.6683	0.484935	A. Berberich.
328 41 7.6	10 36 51.4	5 15 50.9	641.871	0.495039	A. Berberich.

Nr. und Name	Opposition 1900	Gr.	m_0	g	Epoche und Osculation	Mittl. Aequ.	M	ω
401 Ottilia . . .	Jan. 0	12.8	12.6	8.2	1895 April 20.0	1900.0	324° 31′ 46.8″	181° 20′ 19.6″
402 [1895 *BW*]	Juli 6	11.1	10.7	7.7	1895 März 27.5	1895.0	28 44 8.7	12 26 1.5
403 [1895 *BX*]	Juni 17	12.3	12.0	8.5	1900 Juli 3.0	1900.0	127 14 7.2	248 33 33.2
404 [1895 *BY*]	Sept. 27	13.9	13.0	10.0	1899 Mai 29.0	1900.0	17 28 20.0	118 7 7.6
405 [1895 *BZ*]	Sept. 30	12.3	11.0	8.0	1895 Juli 27.0	1895.0	73 36 35.0	305 12 42.1
406 [1895 *CB*]	Sept. 5	12.4	13.5	9.8	1895 Aug. 23.5	1900.0	350 1 59.3	33 31 31.4
407 [1895 *CC*]	Dec. 50	11.9	11.9	8.7	1895 Nov. 10.5	1900.0	17 44 21.6	79 37 50.6
408 [1895 *CD*]	Aug. 19	13.1	13.4	9.2	1895 Oct. 15.5	1900.0	354 28 32.9	100 36 57.2
409 [1895 *CE*]	—	—	10.7	7.6	1899 Nov. 19.0	1900.0	183 45 6.5	351 8 30.1
410 [1896 *CH*]	—	—	11.9	8.3	1896 Jan. 8.5	1900.0	245 34 9.5	143 52 48.7
411 [1896 *CJ*]	Dec. 44	13.3	12.5	8.5	1896 Jan. 8.5	1900.0	158 42 57.5	194 5 56.8
412 Elisabetha .	—	—	12.1	8.5	1899 Nov. 5.0	1900.0	213 52 9.2	88 31 45.8
413 Edburga . .	—	—	12.2	9.2	1896 Jan. 10.5	1900.0	72 21 21.0	248 52 28.4
414 [1896 *CN*]	Sept. 29	13.0	13.4	8.6	1896 Jan. 17.5	1900.0	59 10 8.5	301 48 6.7
415 [1896 *CO*]	—	—	11.6	8.1	1899 Oct. 4.5	1899.0	332 37 13.1	293 31 49.5
416 Vaticana . .	Febr. 9	11.7	11.5	8.0	1900 Jan. 24.5	1900.0	262 34 31.7	195 38 14.1
417 [1896 *CT*]	Jan. 26	12.2	12.7	9.2	1896 Mai 11.5	1900.0	30 48 55.3	344 23 18.1
418 [1896 *CV*]	Aug. 7	12.1	12.6	9.5	1896 Sept. 3.5	1900.0	337 51 7.9	123 50 40.4
419 [1896 *CW*]	Aug. 8	9.7	11.1	8.0	1900 Aug. 12.0	1900.0	29 39 37.8	39 6 50.5
420 Bertholda . .	April 6	12.4	12 3	7.7	1900 April 14.0	1900.0	104 51 47.9	203 7 35.6
421 Zähringia . .	Aug. 26	12.7	14.2	11.2	1896 Sept. 3.5	1900.0	333 0 19.7	205 13 58.6
422 Berolina . .	—	—	13.4	11.2	1896 Dec. 4.5	1900.0	42 36 47.9	334 7 22.3
423 [1896 *DB*]	Juli 13	11.0	11.2	7.2	1896 Dec. 8.5	1900.0	144 40 21.6	199 14 29.5
424 [1896 *DF*]	Nov. 1	12.2	12.8	9.3	1897 Febr. 28.0	1900.0	46 56 47.2	330 21 46.1
425 [1896 *DC*]	Oct. 20	13.5	13.1	9.4	1897 Jan. 20.5	1900.0	297 57 5.8	117 50 18.3
426 [1897 *DH*]	Febr. 22	10.9	11.5	7.8	1897 Sept. 30.0	1900.0	172 10 55.2	221 45 54.7
427 [1897 *DJ*]	Febr. 5	13.7	13.1	9.3	1897 Sept. 2.5	1897.0	26 0 44.7	5 56 12.6
428 Monachia . .	Aug. 6	13.1	13.5	11.1	1900 Aug. 7.5	1900.0	300 39 10.6	13 51 27.9
429 [1897 *DL*]	Mai 25	12.8	11.5	9.4	1897 Nov. 24.5	1900.0	39 2 43.0	144 21 33.6
430 [1897 *DM*]	Juni 3	14.4	13.2	9.6	1898 Jan. 21.5	1898.0	15 12 12.0	174 56 47.0
431 [1897 *DN*]	April 2	13.1	12.6	8.5	1898 Jan. 18.5	1898.0	97 29 58.4	209 20 51.4
432 [1897 *DO*]	Oct. 10	11.5	11.3	8.7	1898 Jan. 22.5	1898.0	184 17 44.4	174 9 13.2
433 Eros	Oct. 30	9.3	9.7	10.6	1900 Oct. 31.5	1900.0	304 23 59.7	177 38 41.6
434 Hungaria . .	März 21	11.9	11.8	10.4	1898 Oct. 10.5	1898.0	58 46 13.8	123 10 7.2
435 [1898 *DS*]	Febr. 5	12.7	12.1	9.3	1898 Sept. 15.5	1900.0	359 41 7.1	330 43 49.4
436 [1898 *DT*]	—	—	12.4	8.2	1898 Sept. 20.5	1898.0	342 35 23.5	26 40 36.8
437 [1898 *DP*]	Jan. 10	13.7	12.7	10.1	1898 Juli 18.5	1900.0	346 24 55.7	58 27 43.3
438 [1898 *DU*]	April 3	13.1	12.3	10.3	1898 Nov. 12.5	1900.0	294 43 28.7	80 9 25.2
439 Ohio . .	Jan. 7	12.5	11.7	7.6	1898 Oct. 14.5	1900.0	310 47 3.7	232 56 54.6
440 [1898 *EC*]	April 19	13.1	13.1	10.9	1898 Oct. 18.5	1900.0	284 37 41.8	176 8 34.9

☊	i	φ	μ	Log. a	Autorität
39° 7′ 57.5″	6° 5′ 36.0″	2° 18′ 50.3″	584.254″	0.522270	A. Berberich.
129 29 53.1	11 50 10.2	6 24 49.0	868.759	0.407405	J. Coniel.
245 42 28.6	9 8 11.3	5 42 4.0	752.51263	0.448995	A. Berberich.
92 50 13.9	14 2 9.2	11 53 30.4	851.5022	0.413214	A. Berberich.
255 55 27.9	11 48 18.6	14 32 24.7	856.814	0.411412	J. Coniel.
317 15 49.5	4 12 31.9	10 31 6.1	714.568	0.463975	A. Capon.
295 9 45.6	7 32 25.8	3 55 13.1	834.430	0.419078	A. Berberich.
299 29 5.2	9 6 11.5	7 54 31.1	627.210	0.501729	A. Berberich.
242 35 48.1	11 12 46.1	3 53 20.9	858.5857	0.410815	F. Kromm.
96 24 55.9	9 32 56.1	12 30 4.9	746.590	0.451283	A. Berberich.
108 7 51.8	19 26 26.9	13 36 34.4	720.585	0.461548	A. Berberich.
106 43 44.6	13 47 21.9	2 16 3.5	772.41065	0.441439	A. Berberich.
105 4 28.9	18 52 26.6	19 43 23.0	856.555	0.411501	A. Berberich.
113 29 2.5	9 39 7.4	5 18 49.6	537.766	0.546275	A. Berberich.
128 13 1.7	8 6 28.9	17 34 0.7	761.2267	0.445662	E. F. Coddington.
58 32 36.8	12 55 48.4	12 34 55.2	761.14731	0.445692	Dr. Boccardi.
200 1 24.1	6 34 34.4	7 43 44.5	757.116	0.447229	A. Berberich.
249 6 42.0	6 48 16.6	6 57 51.8	847.266	0.414658	A. Berberich.
230 13 55.5	3 57 37.7	14 47 31.2	850.7095	0.4134836	A. Berberich.
247 1 6.6	6 39 54.5	2 46 42.3	562.7012	0.5331525	A. Berberich.
187 59 15.4	7 51 37.5	16 53 29.6	876.838	0.404725	A. Berberich.
8 48 49.0	4 58 45.1	12 11 29.9	1070.3195	0.3469954	G. Witt.
70 19 35.0	11 13 35.1	2 17 42.4	663.033	0.485647	A. Berberich.
99 33 18.3	8 11 56.5	6 11 49.6	767.6789	0.4432180	J. Stein S. J.
61 14 34.5	4 2 18.3	4 18 21.8	719.978	0.461792	A. Pourteau.
311 58 22.1	19 37 39.4	5 53 54.4	722.4562	0.4607967	A. Pourteau.
298 45 30.8	5 8 11.1	6 53 23.4	692.493	0.473061	J. Coniel.
17 21 32.2	6 13 28.4	10 15 44.4	1009.005	0.364076	Dr. Villiger.
220 39 12.8	9 48 20.1	8 24 13.0	846.714	0.414845	J. Coniel.
249 49 46.5	14 33 22.3	14 55 51.9	743.475	0.452494	A. Berberich.
117 6 55.6	1 49 1.4	9 43 27.5	642.4286	0.494788	K. Pokrowsky.
88 33 43.8	12 8 5.1	8 27 55.6	975.178	0.373948	A. Berberich.
303 30 40.4	10 49 38.9	12 52 48.2	2015.12740	0.1638027	Prof. Millosevich.
174 37 56.0	22 33 38.1	4 14 43.5	1306.439	0.289278	A. Berberich.
23 6 13.7	1 50 21.0	8 56 51.1	926.096	0.388900	A. Berberich.
352 0 49.6	18 37 46.7	4 41 35.9	622.111	0.504093	A. Berberich.
263 41 9.8	7 23 33.8	14 13 8.7	963.993	0.377288	A. Berberich.
49 39 23.3	6 25 43.8	9 22 43.2	792.554	0.333985	J. Coniel.
202 26 52.5	19 13 27.0	4 19 19.9	637.631	0.496958	E. F. Coddington.
292 20 32.1	1 35 46.4	6 11 19.0	1079.355	0.344562	E. F. Coddington.

Nr. und Name	Opposition 1900	Gr.	m_0	g	Epoche und Osculation	Mittl. Aequ.	M	ω
441 [1898 *ED*] .	—	—	—	—	1898 Dec. 9.5	1899.0	339° 42′ 50.″8	204° 5′ 44.″2
442 [1899 *EE*] .	—	—	—	—	1899 März 30.5	1900.0	308 39 24.9	82 27 53.5
443 [1899 *EF*] .	—	—	—	—	1899 März 31.5	1899.0	327 53 6.6	29 24 41.1
444 [1899 *EL*] .	—	—	—	—	1899 März 31.5	1899.0	207 21 24.3	159 0 39.3
[1894 *BD*] .	—	—	13.3	11.3	1894 Nov. 1.5	1900.0	337 18 8.4	356 39 18.9
[1899 *ER*] .	—	—	—	—	1899 Oct. 29.5	1899.0	53 14 31.1	280 39 29.2
[1899 *EX*] .	—	—	—	—	1899 Oct. 4.5	1899.0	2 43 11.7	79 36 27.4
[1899 *ES*] .	—	—	—	—	1899 Dec. 3.5	1900.0	4 21 31.8	319 16 20.7
[1899 *EU*] .	—	—	—	—	1899 Nov. 2.5	1900.0	276 13 25.7	45 3 21.5
1892 *S* . .	—	—	13.0	9.9	1892 Dec. 17.5	1892.0	77 35 50	0 0 0
1893 *C* . .	—	—	13.5	11.8	1893 Jan. 23.5	1893.0	167 48 0	0 0 0
1893 *D* . .	—	—	12.5	8.6	1893 Jan. 19.5	1893.0	348 50 15	0 0 0
1893 *U* . .	—	—	13.0	10.3	1893 April 10.5	1893.0	93 23 42	0 0 0
1893 *X* . .	—	—	13	7.4	1893 März 21.5	1893.0	112 50 17	0 0 0
1893 *Y* . .	—	—	13	8.3	1893 April 17.5	1893.0	79 39 46	0 0 0
1894 *AW* .	—	—	12	9.5	1894 Febr. 3.5	1894.0	62 6 12	0 0 0
1896 *CU* .	—	—	12.0	8.3	1896 Sept. 3.5	1896.0	100 46 25	0 0 0
1896 *DD* .	—	—	13.0	9.4	1897 Jan. 12.5	1897.0	8 18 14	0 0 0
1896 *DE* .	—	—	13.0	8.9	1897 Jan. 12.5	1897.0	178 29 24	0 0 0
1898 *DW* .	—	—	13.5	10.4	1898 Nov. 19.5	1898.0	181 1 17	0 0 0
1898 *DY* .	—	—	13.5	9.6	1898 Nov. 13.5	1898.0	198 18 19	0 0 0
1898 *DZ* .	—	—	12.5	9.6	1898 Nov. 17.5	1898.0	174 26 37	0 0 0
1898 *EA* .	—	—	13	8.1	1898 Nov. 13.5	1898.0	181 15 2	0 0 0

☊	*i*	*φ*	*μ*	Log. *a*	Autorität
254° 10′ 36″.1	8° 2′ 33″.9	5° 4′ 14″.4	751″.537	0.449370	J. Coniel.
134 41 4.1	6 3 30.6	4 8 45.9	986.875	0.370496	Pfarrer Thraen.
176 3 44.0	3 57 20.5	6 22 43.6	1034.79	0.356774	Pfarrer Thraen.
196 10 18.2	10 35 39.6	10 31 41.6	775.011	0.440466	Lubrano u. Maitre.
72 35 44.3	3 27 48.4	8 33 50.4	1104.735	0.337832	A. Berberich.
42 35 35.2	10 36 27.2	6 41 22.3	761.6344	0.445506	J. Möller.
293 10 50.2	21 25 0.6	11 50 32.5	623.873	0.503274	E. F. Coddington.
72 18 33.0	4 49 33.5	2 36 37.5	687.012	0.475362	Prof. H. Kreutz.
85 38 29.6	3 6 45.4	9 59 28.5	869.056	0.407306	J. Möller.
358 7 42	3 27 18	0 0 0	835.80	0.41860	A. Berberich.
321 27 42	3 33 48	0 0 0	1182.9	0.31804	A. Berberich.
133 20 53	11 44 34	0 0 0	681.61	0.47764	A. Berberich.
88 59 54	7 49 6	0 0 0	944.3	0.38330	A. Charlois.
72 17 48	1 34 4	0 0 0	423.40	0.61550	A. Berberich.
124 24 8	0 18 4	0 0 0	549.95	0.53980	A. Berberich.
21 39 36	4 33 42	0 0 0	996.0	0.36781	A. Berberich.
243 53 26	5 51 46	0 0 0	692.17	0.46320	A. Berberich.
104 44 20	2 52 28	0 0 0	731.37	0.45725	A. Berberich.
295 24 12	9 30 52	0 0 0	645.96	0.49320	A. Berberich.
229 11 55	14 40 58	0 0 0	841.15	0.41675	A. Berberich.
216 46 18	3 15 55	0 0 0	673.12	0.48128	A. Berberich.
239 40 46	3 53 1	0 0 0	881.73	0.40312	A. Berberich.
227 33 5	27 23 43	0 0 0	508.71	0.56236	A. Berberich.

Nr. und Name	Tag der Opp.	Gr.	12h Mittlere Zeit AR.	Decl.	Δα	Δδ	Log. Δ	Letzte Beobachtung
			h m	° ′	m	′		
401 Ottilia	Jan. 0	12.8	6 42.1	+30 34	0.9	+ 2	0.383	1895
185 Eunike	0	10.3	6 43.9	— 6 15	0.7	+ 5	—	1898
64 Angelina . . .	2	9.7	6 51.3	+24 2	1.0	+ 1	0.139	1896
5 Astraea	3	8.8	6 55.2	+16 43	1.0	+ 3	—	1897
361 [1893 *P*] . . .	3	12.2	6 57.8	+40 55	0.9	+ 1	0.344	1893
124 Alkeste	4	10.6	7 1.6	+18 10	1.0	+ 1	—	1897
396 [1894 *BL*] . .	5	14.0	7 4.0	+20 57	1.2	— 3	0.347	1894
102 Miriam	5	12.8	7 8.9	+14 49	1.0	+ 2	—	1894
228 Agathe	6	15.3	7 11.3	+24 23	1.2	+ 1	0.187	1895
439 Ohio	7	12.5	7 18.7	— 6 23	0.8	+ 1	0.310	1898
197 Arete	10	13.3	7 24.6	+28 3	1.0	+ 4	0.321	1898
437 [1898 *DP*] .	10	13.7	7 26.2	+16 47	1.1	+ 1	0.268	1898
196 Philomela . . .	11	10.5	7 31.0	+28 15	0.9	+ 4	0.341	1897
279 Thule	11	14.1	7 32.7	+19 14	0.6	+ 1	0.545	1897
145 Adeona	11	10.5	7 34.8	+33 57	1.1	+ 7	—	1894
137 Meliboea . . .	12	12.8	7 34.2	+ 3 30	0.8	+ 2	0.450	1897
130 Elektra	13	10.5	7 40.3	+ 3 10	0.8	+ 7	0.314	1897
187 Lamberta . . .	13	11.4	7 40.7	+37 52	1.1	+ 5	0.249	1897
148 Gallia	15	10.6	7 47.4	+ 0 56	0.9	+11	—	1898
369 Aëria	17	12.9	7 59.5	+28 21	1.0	+ 6	0.246	1895
374 [1893 *AK*] . .	18	11.9	7 59.7	+ 6 58	0.9	+ 2	0.283	1894
199 Byblis	18	13.1	8 4.5	+30 36	0.9	+ 5	—	1897
218 Bianca	20	11.5	8 11.3	+ 1 55	0.9	+ 6	0.248	1893
53 Kalypso	21	10.5	8 16.1	+16 7	1.0	+ 6	0.056	1898
400 [1895 *BU*] . .	23	14.4	8 22.1	+26 42	1.0	0	—	1895
99 Dike	24	14.5	8 24.7	+39 57	1.1	+ 4	0.312	1868
166 Rhodope . . .	25	12.2	8 34.0	+18 40	0.9	+ 9	0.184	1897
417 [1896 *CT*] . .	26	12.2	8 35.7	+ 8 11	0.9	+ 4	0.200	1896
135 Hertha	27	11.5	8 38.1	+20 41	1.0	+ 3	0.282	1897
*113 Amalthea . . .	27	10.8	8 42.6	+18 57	1.0	+ 7	0.118	1898
132 Aethra	28	8.7	8 42.8	—26 4	1.1	—17	—	1873
191 Kolga	30	12.1	8 51.0	+ 9 13	0.8	+ 6	0.296	1897
28 Bellona	31	9.2	8 55.2	+13 42	0.8	+ 8	0.140	1898
*154 Bertha	31	11.2	8 56.9	+48 35	1.1	+ 2	0.345	1898
114 Kassandra . .	31	10.3	8 57.4	+12 32	0.9	+ 6	0.128	1897
333 Badenia	Febr. 1	13.1	9 0.3	+20 57	0.9	+ 3	0.369	1895
399 [1895 *BP*] . .	1	12.7	9 1.2	+29 41	1.0	0	0.283	1895
317 Roxane	1	12.6	9 1.9	+16 0	1.1	+ 5	0.170	1898
231 Vindobona . .	3	12.7	9 9.9	+21 14	0.9	+ 3	0.327	1897
435 [1898 *DS*] . .	5	12.7	9 16.7	+18 37	1.0	+ 4	0.241	1898
379 [1894 *AQ*] . .	5	13.4	9 19.1	+14 18	0.8	+ 4	0.415	1898
427 [1897 *DJ*] . .	5	13.7	9 19.2	+13 9	0.8	+ 3	0.368	1897

Nr. und Name	Tag der Opp.	Gr.	12h Mittlere Zeit AR.	Decl.	Δα	Δδ	Log. Δ	Letzte Beobachtung
			h m	° ′	m	′		
219 Thusnelda . .	Febr. 8	12.4	9 28.7	+ 0 8	0.9	+ 6	0.272	1898
253 Mathilde . . .	8	14.7	9 30.9	+ 8 31	0.8	+ 5	0.369	1898
416 Vaticana . . .	9	11.7	9 30.3	+34 35	1.0	+ 5	0.304	1898
26 Proserpina . .	9	10.6	9 30.8	+20 42	1.0	+ 4	0.227	1898
181 Eucharis . . .	9	10.5	9 33.2	+12 24	0.7	+12	0.201	1895
381 [1894 *AS*] . . .	9	12.6	9 34.4	+19 16	0.7	+ 7	0.388	1896
280 Philia	11	14.0	9 39.7	+23 36	0.9	+ 2	0.237	1890
234 Barbara	11	12.9	9 41.3	+12 21	0.9	+ 8	0.293	1894
96 Aegle	12	10.5	9 41.8	+13 24	1.0	— 1	0.226	1897
* 33 Polyhymnia .	14	13.3	9 53.8	+14 42	0.8	+ 4	0.440	1898
397 [1894 *BM*] . .	15	13.1	9 56.5	— 6 41	0.9	+ 5	0.335	1898
40 Harmonia . . .	15	9.0	9 58.5	+18 33	1.3	+ 8	0.034	1897
86 Semele	16	12.7	9 58.1	+18 37	0.8	+ 5	0.362	1897
225 Henrietta . . .	18	13.7	10 5.7	— 9 30	0.7	+ 5	0.490	1897
188 Menippe . . .	18	13.5	10 9.3	— 6 39	0.8	+ 5	0.348	1897
339 Dorothea . . .	19	13.2	10 8.0	+ 5 38	0.7	+ 6	0.368	1896
426 [1897 *DH*] . .	22	10.9	10 23.8	— 4 58	1.1	0	0.212	1897
318 Magdalena . .	22	13.2	10 24.1	+ 7 37	0.7	+ 7	0.334	1898
138 Tolosa	23	12.7	10 25.8	+15 7	1.0	+ 5	0.261	1897
84 Klio	23	12.6	10 27.7	+ 7 30	1.0	+ 3	0.285	1898
267 Tirza	28	14.1	10 44.6	+17 51	0.9	+ 5	0.271	1891
*164 Eva	März 3	12.4	10 58.1	+42 15	1.1	+ 4	0.400	1898
169 Zelia	3	12.0	10 58.3	+ 8 36	1.0	+ 4	0.220	1898
266 Aline	4	12.4	10 57.4	—12 53	0.8	+ 6	0.338	1898
283 Emma	4	12.5	11 0.5	— 1 32	0.8	+ 3	0.400	1899
289 Nenetta	4	13.4	11 2.2	+ 3 5	0.8	+ 6	0.381	1891
* 19 Fortuna	5	10.4	11 6.1	+ 3 52	0.9	+ 6	0.227	1898
235 Carolina	6	12.3	11 10.7	+20 0	0.8	+ 4	0.293	1897
* 37 Fides	7	10.4	11 13.1	+ 7 1	0.9	+ 5	0.216	1898
383 [1894 *AU*] . .	7	13.6	11 16.7	+ 8 37	0.8	+ 5	0.366	1894
30 Urania	7	10.4	11 14.3	+ 2 32	1.0	+ 6	0.196	1897
271 Penthesilea . .	8	13.5	11 15.4	+ 3 43	0.8	+ 4	0.350	1897
315 Constantia . .	9	14.9	11 19.0	+ 4 58	1.0	+ 7	0.205	1891
*248 Lameia	9	12.9	11 21.2	— 2 58	0.9	+ 6	0.158	1898
319 Leona	9	14.7	11 21.8	— 0 56	0.7	+ 6	0.431	1891
194 Prokne	10	11.5	11 22.0	+ 8 24	0.8	+ 4	0.329	1897
81 Terpsichore . .	10	12.2	11 24.5	+ 6 42	0.9	+ 3	0.315	1893
262 Valda	13	14.3	11 33.9	+12 57	1.0	+ 4	0.213	1898
382 [1894 *AT*] . .	14	11.4	11 37.0	— 5 43	0.8	+ 3	0.235	1894
308 Polyxo	15	11.1	11 42.3	+ 1 8	0.8	+ 7	0.256	1897
179 Klytæmnestra .	15	12.1	11 43.4	— 9 53	0.8	+ 5	0.367	1897
205 Martha	16	12.8	11 43.3	— 8 16	0.8	+ 8	0.273	1893

Nr. und Name	Tag der Opp.	Gr.	12h Mittlere Zeit AR.	Decl.	Δα	Δδ	Log. Δ	Letzte Beobachtung
			h m	° ′	m	′		
434 Hungaria . . .	März 21	11.9	12 1.5	+ 4 25	0.9	+23	0.004	1899
117 Lomia	21	11.5	12 5.2	− 6 12	0.9	+ 1	0.314	1892
* 46 Hestia	22	11.5	12 5.1	− 0 33	0.9	+ 6	0.289	1899
282 Clorinde . . .	22	13.3	12 5.2	+ 9 8	0.9	+ 9	0.138	1898
200 Dynamene . .	22	11.5	12 6.1	− 7 41	0.9	+ 4	0.297	1893
311 Claudia	24	13.0	12 12.8	+ 3 58	0.8	+ 5	0.273	1895
21 Lutetia	25	10.8	12 14.2	− 1 24	0.9	+ 3	0.240	1897
352 Gisela	25	12.8	12 16.4	− 7 9	1.0	+ 7	0.173	1898
75 Eurydike . . .	25	12.8	12 18.5	− 2 43	0.9	+ 4	0.362	1895
101 Helena	27	11.2	12 22.9	− 9 43	1.0	+ 3	0.266	1899
233 Asterope . . .	27	11.8	12 24.3	− 9 29	1.2	+ 7	0.282	1897
314 Rosalia	28	14.9	12 29.2	+ 1 47	0.7	+ 6	0.437	1891
134 Sophrosyne . .	29	11.4	12 33.8	−12 8	1.0	+ 2	0.235	1898
58 Concordia . . .	29	11.2	12 34.3	+ 0 20	0.8	+ 7	0.201	1898
174 Phaedra	April 1	11.2	12 41.4	−20 3	1.0	+ 2	0.215	1897
144 Vibilia	1	11.9	12 41.7	+ 2 27	0.8	+ 5	0.358	1897
431 [1897 *DN*] . .	2	13.1	12 48.4	− 2 30	0.7	+ 5	0.388	1898
438 [1898 *DU*] . .	3	13.1	12 49.2	+ 1 57	0.9	+ 3	0.164	1898
378 [1893 *AP*] . .	4	13.2	12 52.4	−12 20	0.8	+ 6	0.329	1897
338 Budrosa	4	12.2	12 54.6	−15 42	0.8	+ 5	0.297	1893
377 [1893 *AN*] . .	4	13.0	12 55.8	− 8 50	0.8	+ 7	0.272	1899
391 Ingeborg . . .	6	14.8	12 59.2	−15 54	0.8	+11	0.294	1896
105 Artemis	6	10.3	13 2.4	− 0 27	0.7	+20	0.023	1898
420 Bertholda . . .	6	12.4	13 4.7	−14 24	0.7	+ 5	0.392	1897
193 Ambrosia . . .	7	12.9	13 5.8	−16 21	1.0	+ 3	0.278	1879
294 Felicia	8	14.7	13 9.8	+ 0 52	0.7	+ 5	0.374	1891
152 Atala	8	12.4	13 10.0	+ 0 37	0.8	+ 2	0.346	1894
171 Ophelia	9	11.6	13 11.1	− 3 22	0.7	+ 4	0.272	1897
316 Goberta	10	13.7	13 17.9	− 4 48	0.7	+ 5	0.381	1891
* 61 Danaë	14	11.5	13 28.5	−32 53	1.0	+ 1	0.363	1899
66 Maja	14	13.0	13 29.6	−10 47	0.9	+ 4	0.312	1893
18 Melpomene . .	15	10.4	13 35.1	+ 3 25	0.9	+ 7	0.256	1896
440 [1898 *EC*] . .	19	13.1	13 47.3	−14 9	1.0	+ 6	0.089	1899
203 Pompeja . . .	20	11.0	13 52.0	−15 2	0.9	+ 4	0.278	1895
201 Penelope . . .	20	12.3	13 54.9	− 4 52	0.8	+ 6	0.278	1897
297 Caecilia	20	13.4	13 54.6	−21 51	0.7	+ 3	0.351	1891
299 Thora	21	14.7	13 55.8	−13 16	0.9	+ 6	0.198	1892
329 Svea	24	11.4	14 11.1	+ 2 56	0.8	+11	0.153	1896
206 Hersilia	25	12.1	14 12.0	− 7 31	0.8	+ 5	0.256	1895
186 Celuta	25	11.6	14 13.0	−22 40	1.2	0	0.158	1897
140 Siwa	25	11.0	14 13.2	− 8 10	0.9	+ 4	0.192	1896
350 Ornamenta . .	26	13.4	14 13.5	+19 27	0.8	0	0.414	1894

Nr. und Name	Tag der Opp.	Gr.	12ʰ Mittlere Zeit AR.	Decl.	Δα	Δδ	Log. Δ	Letzte Beobachtung
			h m	° ′	m	′		
* 92 Undina	April 29	11.0	14 27.9	− 0 43	0.8	+3	0.357	1897
388 [1894 *BA*] . .	30	11.8	14 29.4	−22 8	0.9	+2	0.311	1894
240 Vanadis	Mai 2	13.5	14 38.0	−12 21	0.9	+4	0.343	1897
302 Clarissa	3	14.4	14 40.2	−18 58	1.0	+4	0.219	1892
364 [1893 *T*] . . .	3	12.5	14 40.5	− 6 14	1.0	+4	0.188	1896
120 Lachesis . . .	3	11.4	14 41.0	−25 36	0.8	+2	0.285	1897
310 Margarita . . .	6	12.9	14 55.5	−17 9	0.8	+5	0.170	1891
252 Clementina . .	7	13.2	14 56.5	−11 7	0.8	+5	0.362	1892
291 Alice	7	13.6	14 58.4	−13 44	1.0	+5	0.084	1893
*106 Dione	8	12.1	15 3.5	−15 32	0.8	+2	0.421	1898
* 79 Eurynome . .	9	11.5	15 5.5	−14 43	0.9	+5	0.279	1899
139 Juewa	10	10.4	15 10.2	−32 7	1.1	0	0.191	1898
250 Bettina	11	12.2	15 12.8	−26 33	0.9	0	0.386	1899
47 Aglaja	16	10.9	15 29.1	−25 20	0.9	+1	0.240	1899
349 Dembowska .	16	10.1	15 33.7	−24 14	0.6	+1	0.321	1899
386 [1894 *AY*] . .	19	10.9	15 44.3	+ 7 34	0.8	+4	0.372	1899
320 Katharina . . .	20	14.5	15 48.0	−15 44	0.8	+5	0.337	1891
309 Fraternitas . .	20	12.6	15 51.6	−26 1	1.0	+2	0.203	1891
189 Phthia	21	12.2	15 52.6	−14 59	0.9	+1	0.175	1897
* 11 Parthenope . .	21	9.1	15 53.4	−12 46	1.0	+2	0.139	1899
281 Lucretia . . .	21	14.3	15 55.4	−25 1	1.2	+1	0.160	1890
348 May	22	13.3	15 57.1	−13 9	0.8	+1	0.354	1895
300 Geraldina . . .	23	13.8	16 1.0	−21 3	0.8	+2	0.337	1892
210 Isabella	23	13.0	16 2.0	−24 45	1.0	+1	0.305	1897
100 Hekate	24	11.3	16 3.5	−11 24	0.7	+2	0.253	1896
159 Aemilia	24	12.6	16 4.3	−12 15	0.8	+2	0.362	1897
429 [1897 *DL*] . .	25	12.8	16 6.8	−14 49	0.9	+6	0.242	1897
77 Frigga	26	11.8	16 13.9	−24 34	1.0	+2	0.303	1897
*149 Medusa	29	13.4	16 22.7	−19 54	1.1	+3	0.113	1893
255 Oppavia	29	13.7	16 23.9	−34 11	1.1	0	0.234	1890
229 Adelinda . . .	Juni 1	13.3	16 37.5	−24 8	0.8	+1	0.356	1892
104 Klymene . . .	1	12.9	16 39.9	−24 6	0.8	+1	0.416	1898
*122 Gerda	2	11.3	16 41.2	−19 55	0.8	+2	0.324	1899
284 Amalia	3	11.6	16 46.2	−16 46	0.9	+9	9.950	1893
430 [1897 *DM*] . .	3	14.4	16 46.7	−21 15	0.9	+4	0.404	1898
380 [1894 *AR*] . .	6	12.3	16 57.8	−19 12	1.0	−1	0.194	1897
357 [1893 *J*] . . .	7	12.5	17 2.6	− 4 23	0.8	−1	0.345	1893
* 65 Cybele	8	10.4	17 6.2	−17 44	0.8	+1	0.317	1899
*247 Eukrate	10	12.1	17 14.0	−58 13	1.5	−1	0.379	1898
346 Hermentaria .	13	11.7	17 25.2	−20 46	0.9	−2	0.277	1899
9 Metis	13	9.5	17 25.8	−25 15	1.1	−1	0.219	1899
340 Eduarda . . .	13	13.5	17 26.8	−29 1	1.0	0	0.312	1899

Nr. und Name	Tag der Opp.	Gr.	12h Mittlere Zeit AR.	Decl.	Δα	Δδ	Log. Δ	Letzte Beob-achtung
			h m	° ′	m	′		
251 Sophia	Juni 15	14.2	17 30.1	− 8 57	0.8	0	0.382	1890
403 [1895 *BX*] . .	17	12.3	17 47.9	−18 24	0.9	+ 3	0.295	1899
293 Brasilia	21	13.2	17 59.0	−34 42	1.0	− 2	0.310	1890
232 Russia	21	12.9	18 0.8	−13 57	0.9	− 2	0.123	1893
10 Hygiea	22	8.9	18 6.5	−25 6	0.9	+ 1	0.257	1895
48 Doris	22	11.2	18 6.8	−14 4	0.8	0	0.360	1898
172 Baucis.	23	10.0	18 6.2	−39 29	1.2	+ 1	0.086	1899
97 Klotho.	23	11.7	18 10.5	− 7 33	0.8	0	0.351	1894
115 Thyra	24	10.9	18 11.2	−34 44	1.2	+ 3	0.210	1897
22 Kalliope . . .	24	10.2	18 13.3	−32 32	1.0	− 4	0.328	1896
* 6 Hebe	27	8.5	18 26.1	− 6 2	1.0	− 5	0.154	1899
60 Echo.	29	12.1	18 34.7	−17 37	1.0	− 1	0.260	1899
216 Kleopatra . . .	Juli 1	10.3	18 42.4	− 4 57	0.9	+ 2	0.277	1896
209 Dido.	3	11.3	18 47.8	−33 55	0.9	− 1	0.291	1896
276 Adelheid . . .	4	12.2	18 56.4	+ 6 41	1.0	− 2	0.380	1898
2 Pallas	5	9.2	18 56.9	+21 56	0.8	− 3	0.410	1899
230 Athamantis . .	5	10.3	18 59.1	−11 11	1.0	+ 2	0.138	1897
402 [1895 *BW*] . .	6	11.1	19 0.2	−14 44	0.9	− 5	0.244	1899
*288 Glauke	6	12.1	19 1.7	−20 38	0.9	− 3	0.192	1899
360 [1893 *N*] . . .	6	12.4	19 2.4	−13 51	0.8	− 4	0.364	1893
36 Atalante . . .	6	12.5	19 5.0	−49 56	1.4	− 1	0.307	1896
160 Una	9	12.0	19 11.9	−28 25	1.0	− 1	0.262	1897
223 Rosa	10	13.8	19 16.8	−24 41	0.8	− 2	0.389	1893
204 Kallisto	12	11.0	19 25.0	− 7 0	0.9	− 1	0.104	1896
423 [1896 *DB*] . .	13	11.0	19 29.7	−32 55	0.9	− 4	0.288	1899
224 Oceana	13	11.4	19 33.0	−30 34	1.0	0	0.185	1899
370 [1893 *AC*] . .	14	12.5	19 33.1	−21 32	1.1	+ 2	0.081	1895
150 Nuwa	15	11.1	19 39.2	−18 5	0.8	− 2	0.243	1893
367 [1893 *AA*] . .	16	12.9	19 41.6	−24 1	1.1	− 4	0.144	1896
222 Lucia	17	12.1	19 45.4	−23 13	0.8	− 3	0.237	1899
384 Burdigala . . .	17	12.3	19 45.8	−29 10	1.0	− 3	0.288	1899
286 Iclea	17	13.2	19 46.8	− 6 25	0.7	− 6	0.343	1898
49 Pales	17	11.0	19 47.3	−20 45	0.8	− 1	0.310	1895
20 Massalia. . . .	20	9.9	19 57.5	−19 36	1.0	− 3	0.235	1899
325 Heidelberga .	21	12.7	20 3.3	−29 41	0.9	− 1	0.383	1898
168 Sibylla	21	11.5	20 5.0	−13 36	0.7	− 2	0.365	1898
34 Circe	23	11.9	20 11.4	−12 24	0.9	− 3	0.282	1899
385 Ilmatar	23	10.7	20 12.1	−35 32	1.1	0	0.311	1899
112 Iphigenia	27	10.8	20 25.5	−21 0	1.0	− 2	0.053	1895
94 Aurora	27	11.4	20 26.6	−29 49	0.9	− 2	0.353	1895
273 Atropos	29	10.7	20 31.5	+ 2 22	0.8	−16	0.030	1897
29 Amphitrite . .	29	9.2	20 35.5	−26 42	1.1	− 2	0.205	1899

Nr. und Name	Tag der Opp.	Gr.	12^h Mittlere Zeit AR.	Decl.	Δα	Δδ	Log. Δ	Letzte Beob-achtung
			h m	° ′	m	′		
*190 Ismene	Juli 29	12.7	20 36.3	—12 25	0.6	— 3	0.543	1898
*118 Peitho	31	11.3	20 42.3	—30 55	1.1	— 4	0.222	1899
353 [1893 *F*] . . .	Aug. 1	14.4	20 44.6	—21 56	1.0	— 5	0.248	1893
98 Ianthe	1	12.4	20 46.9	—35 51	1.1	0	0.331	1894
1 Ceres	3	7.8	20 54.6	—29 58	0.9	— 5	0.294	1899
366 Vincentina . .	5	12.1	20 59.8	—27 15	0.9	— 1	0.290	1898
131 Vala	5	12.2	21 3.8	—25 6	1.0	— 8	0.150	1899
428 Monachia . . .	6	13.1	21 5.9	—27 41	1.1	— 3	0.065	1897
418 [1896 *CV*] . .	7	12.1	21 10.6	— 4 56	0.9	— 2	0.144	1896
419 [1896 *CW*] . .	8	9.7	21 14.5	— 7 53	0.9	— 4	0.025	1899
263 Dresda	9	13.0	21 16.9	—13 43	0.8	— 4	0.242	1898
202 Chryseïs . . .	9	11.2	21 17.9	—15 35	0.7	— 6	0.375	1895
356 [1893 *G*] . . .	9	12.2	21 18.0	—24 26	1.0	— 2	0.277	1898
321 Florentina . .	10	13.3	21 22.3	—19 33	0.8	— 4	0.285	1898
358 [1893 *K*] . . .	11	12.5	21 22.8	—12 11	0.8	— 5	0.278	1899
167 Urda	12	12.8	21 28.2	—13 45	0.7	— 4	0.239	1895
390 [1894 *BC*] . .	13	13.9	21 30.9	— 9 17	1.1	— 1	0.298	1897
156 Xanthippe . .	18	13.1	21 50.7	— 2 3	0.7	+ 2	0.451	1875
408 [1895 *CD*]. . .	19	13.1	21 54.6	— 5 41	0.8	— 2	0.296	1895
43 Ariadne	20	9.1	21 56.9	— 5 37	1.0	— 4	9.966	1897
83 Beatrix	20	11.6	21 58.3	—20 7	1.0	— 3	0.193	1899
195 Eurykleia . . .	24	12.4	22 15.1	—17 51	0.7	— 1	0.291	1896
274 Philagoria . .	25	13.8	22 15.3	—15 39	0.8	— 5	0.342	1899
421 Zähringia . . .	26	12.7	22 20.9	— 1 5	0.7	— 9	0.006	1896
59 Elpis	27	10.4	22 24.3	— 5 42	0.8	— 8	0.164	1894
351 Yrsa	27	12.9	22 26.0	—21 19	0.8	— 6	0.330	1894
312 Pierretta . . .	29	12.0	22 34.1	—17 52	0.9	— 2	0.193	1899
50 Virginia . . .	31	9.8	22 36.4	— 7 5	0.7	— 6	9.974	1896
298 Baptistina . .	Sept. 3	14.1	22 48.4	—13 6	1.0	— 4	0.165	1893
296 Phaëtusa . . .	3	12.3	22 49.2	—10 4	0.9	— 6	9.956	1890
406 [1895 *CB*] . .	5	12.4	22 55.7	— 3 23	0.8	— 3	0.138	1895
*226 Weringia . . .	10	12.3	23 16.0	—19 30	0.7	—11	0.139	1898
221 Eos	10	10.6	23 16.3	—12 14	0.7	— 8	0.235	1898
328 Gudrun	11	12.4	23 18.6	— 6 49	0.9	— 1	0.338	1892
285 Regina	11	13.8	23 19.0	+16 39	1.0	0	0.183	1889
354 Eleonora . . .	13	10.6	23 23.7	—17 13	0.7	— 9	0.322	1899
* 24 Themis	15	11.4	23 32.0	— 3 52	0.7	— 5	0.393	1898
*108 Hecuba	15	12.2	23 33.2	— 2 52	0.7	— 4	0.404	1898
389 [1894 *BB*] . .	16	11.5	23 34.4	+10 29	0.9	— 5	0.254	1899
* 82 Alkmene . . .	16	12.0	23 38.1	— 4 52	0.8	— 5	0.335	1898
175 Andromache .	19	11.2	23 46.5	— 4 13	0.8	— 4	0.218	1897
87 Sylvia	20	11.4	23 51.6	—18 1	0.7	— 4	0.340	1897

Nr. und Name	Tag der Opp.	Gr.	12h Mittlere Zeit AR.	Decl.	Δα	Δδ	Log. Δ	Letzte Beobachtung
			h m	° ′	m	′		
387 Aquitania . . .	Sept. 21	9.1	23 52.4	−24 3	0.8	− 9	0.159	1899
287 Nephthys . . .	21	10.7	23 53.0	−11 21	0.8	− 9	0.134	1899
133 Cyrene	21	11.5	23 55.5	+ 6 49	0.8	− 4	0.342	1896
334 Chicago	22	12.0	0 0.0	− 4 46	0.6	− 4	0.455	1899
107 Camilla	23	11.3	0 0.8	− 0 57	0.6	− 6	0.407	1894
*241 Germania . . .	23	10.7	0 3.1	+ 9 43	0.8	− 5	0.250	1899
261 Prymno	25	12.3	0 6.7	− 5 48	0.9	− 6	0.184	1897
344 Desiderata . .	26	10.6	0 14.7	−27 56	1.3	+ 5	0.087	1896
342 Endymion . .	27	12.7	0 14.6	+11 11	0.9	− 7	0.182	1896
404 [1895 *BY*] . .	27	13.9	0 15.1	−21 1	0.9	− 5	0.310	1899
322 Phaeo	29	11.1	0 21.7	+17 17	0.7	− 7	0.045	1895
414 [1896 *CN*] . .	29	13.0	0 23.4	−11 30	0.7	− 5	0.365	1896
143 Adria	29	12.8	0 25.1	+13 55	0.9	− 2	0.287	1895
3 Juno	29	7.4	0 25.1	− 4 1	0.7	−14	0.057	1899
405 [1895 *BZ*] . .	30	12.3	0 25.0	+19 31	0.9	− 6	0.349	1899
12 Victoria	Oct. 3	8.9	0 37.3	+16 15	0.9	− 7	0.031	1896
*270 Anahita	5	10.2	0 42.8	+ 9 18	0.9	− 7	9.969	1897
109 Felicitas . . .	6	10.3	0 49.8	+ 8 10	1.0	+ 1	0.009	1897
215 Oenone	9	12.7	0 57.8	+ 5 41	0.8	− 5	0.226	1896
376 [1893 *AM*] . .	9	12.2	0 59.1	+15 53	1.0	− 7	0.162	1899
213 Lilaea	9	11.6	1 1.2	− 4 25	0.8	− 5	0.234	1898
432 [1897 *DO*] . .	10	11.5	1 3.6	−14 37	1.0	− 3	0.168	1898
69 Hesperia . . .	13	10.5	1 13.4	+ 4 44	0.7	− 7	0.284	1892
264 Libussa	13	11.3	1 15.9	− 2 9	0.9	0	0.157	1896
246 Asporina . . .	14	12.0	1 18.1	− 6 32	0.8	− 4	0.266	1899
70 Panopaea . . .	18	10.6	1 31.3	+ 0 35	1.0	− 1	0.172	1896
*178 Belisana . . .	18	12.1	1 31.5	+ 8 3	0.9	− 5	0.181	1894
326 Tamara	19	11.5	1 36.0	+ 4 13	1.3	+ 3	0.157	1899
347 Pariana	19	12.7	1 36.9	− 6 53	0.9	− 3	0.299	1899
335 Roberta	20	11.6	1 40.8	+ 2 43	0.9	− 6	0.163	1899
425 [1896 *DC*] . .	20	13.5	1 42.3	+ 6 58	0.8	− 4	0.320	1896
269 Justitia	20	13.0	1 42.4	+ 3 46	0.9	− 6	0.238	1895
* 17 Thetis	22	10.4	1 46.7	+ 1 29	0.9	− 5	0.214	1899
173 Ino	24	9.8	1 57.2	−11 23	0.7	− 8	0.092	1899
177 Irma	25	10.9	1 57.3	+13 18	0.8	− 4	0.059	1895
305 Gordonia . . .	27	11.8	2 7.8	+12 33	0.8	− 6	0.248	1894
44 Nysa	29	9.2	2 9.7	+ 5 15	0.9	− 6	0.069	1896
*433 Eros	30	9.3	2 18.4	+53 32	1.8	+ 9	9.616	1899
254 Augusta . . .	30	13.9	2 18.7	+15 8	1.1	− 3	0.141	1892
265 Anna	30	15.3	2 18.8	+51 11	1.5	0	0.344	1899
365 [1893 *V*] . . .	31	11.3	2 21.3	+ 2 33	0.7	− 9	0.151	1898
227 Philosophia . .	Nov. 1	13.8	2 27.7	+27 5	0.8	− 3	0.451	1897

Nr. und Name	Tag der Opp.	Gr.	12h Mittlere Zeit AR.	Decl.	Δα	Δδ	Log. Δ	Letzte Beobachtung
			h m	° '	m	'		
424 [1896 *DF*] . .	Nov. 1	12.2	2 28.0	+ 1 59	0.9	− 2	0.187	1898
111 Ate	2	11.0	2 30.1	+23 25	1.0	− 5	0.173	1891
304 Olga	2	11.6	2 32.1	−10 57	0.9	− 7	0.069	1896
268 Adorea	4	13.1	2 39.2	+11 59	0.8	− 4	0.381	1897
211 Isolda	5	10.6	2 41.5	+20 1	1.0	− 6	0.210	1895
151 Abundantia .	5	11.8	2 43.3	+16 40	1.0	− 2	0.220	1898
90 Antiope	7	11.7	2 52.3	+14 59	0.8	− 3	0.342	1899
258 Tyche	10	10.1	3 1.9	+ 8 18	0.8	−12	0.086	1899
249 Ilse	10	12.5	3 2.8	+37 1	1.2	− 2	9.988	1896
*176 Idunna	11	10.2	3 5.9	+ 0 57	0.7	−11	0.230	1898
272 Antonia	12	13.5	3 8.9	+19 14	1.0	− 2	0.239	1890
303 Josephina . .	12	11.7	3 12.7	+27 54	0.9	− 2	0.285	1899
* 76 Freia	13	11.2	3 12.4	+16 53	0.8	− 4	0.287	1898
244 Sita	14	13.0	3 21.1	+16 12	1.0	− 2	9.972	1890
*170 Maria	17	11.5	3 30.6	+41 7	1.2	− 6	0.169	1899
363 [1893 *S*]	17	11.4	3 30.7	+17 18	1.0	− 1	0.218	1899
212 Medea	21	11.5	3 46.3	+26 31	0.9	− 3	0.246	1896
32 Pomona	21	10.9	3 48.8	+17 15	1.0	− 5	0.241	1899
162 Laurentia . . .	24	12.0	4 1.8	+24 40	1.0	− 1	0.270	1897
129 Antigone . . .	25	11.3	4 4.0	+ 4 5	0.8	− 1	0.401	1894
16 Psyche	27	9.1	4 14.8	+16 17	0.9	− 2	0.215	1899
245 Vera	27	11.5	4 15.6	+21 50	0.9	0	0.196	1896
38 Leda	27	10.6	4 15.8	+30 30	1.1	− 4	0.146	1898
217 Eudora	28	13.3	4 18.8	+ 5 56	0.9	− 2	0.288	1890
239 Adrastea . . .	28	13.1	4 19.9	+12 0	0.9	− 3	0.152	1890
125 Liberatrix . .	30	11.6	4 23.9	+14 43	0.9	− 2	0.290	1893
39 Laetitia	Dec. 1	9.2	4 29.0	+ 5 6	0.9	− 1	0.217	1897
236 Honoria	1	12.0	4 31.9	+10 51	0.9	− 3	0.205	1890
41 Daphne	2	11.6	4 32.5	+ 0 51	0.8	− 3	0.385	1893
85 Io	2	11.0	4 36.0	+ 8 31	0.9	− 4	0.234	1899
155 Scylla	2	11.9	4 36.5	+34 32	1.1	+ 5	0.080	1875
*121 Hermione . . .	3	11.0	4 40.6	+21 11	0.9	0	0.357	1898
295 Theresia . . .	4	12.5	4 41.3	+24 13	0.9	− 3	0.128	1897
277 Elvira	4	12.9	4 44.3	+21 44	0.9	− 2	0.253	1895
207 Hedda	5	11.5	4 47.1	+27 1	1.2	0	0.132	1898
368 [1893 *AB*] . .	6	13.8	4 53.5	+17 55	0.9	− 3	0.355	1893
51 Nemausa . . .	8	9.9	4 57.9	+ 6 4	1.0	− 2	0.154	1899
13 Egeria	8	9.9	4 59.5	+38 39	1.3	+ 5	0.158	1898
275 Sapientia . . .	8	11.8	5 2.6	+16 23	1.0	− 1	0.233	1897
306 Unitas	9	11.2	5 2.7	+12 12	1.1	0	0.191	1899
72 Feronia	10	11.6	5 8.1	+15 55	1.1	− 3	0.158	1898
260 Huberta	10	13.9	5 9.5	+14 11	0.9	− 1	0.403	1889

Nr. und Name	Tag der Opp.	Gr.	12ʰ Mittlere Zeit AR.	Decl.	Δα	Δδ	Log. Δ	Letzte Beobachtung
			h m	° ′	m	′		
93 Minerva	Dec. 11	11.5	5 13.6	+35 8	1.1	0	0.333	1893
63 Ausonia . . .	13	10.6	5 22.1	+32 0	1.2	— 2	0.235	1896
183 Istria	17	10.7	5 41.6	—20 0	0.9	+11	0.038	1897
142 Polana	18	12.7	5 43.2	+24 56	1.1	— 1	0.215	1898
157 Dejanira . . .	18	13.3	5 44.3	+32 51	1.1	+ 8	0.035	1875
257 Silesia	19	12.1	5 48.8	+27 55	1.0	+ 1	0.249	1899
68 Leto	20	10.5	5 54.0	+31 59	1.1	+ 2	0.262	1898
220 Stephania . . .	21	13.8	5 56.6	+21 2	1.2	— 3	0.172	1881
52 Europa	24	9.6	6 9.2	+16 22	0.9	+ 2	0.245	1897
67 Asia	24	12.0	6 10.6	+14 44	1.0	0	0.253	1895
292 Ludovica . . .	26	12.6	6 21.9	+42 10	1.3	+ 4	0.209	1898
127 Johanna . . .	27	10.2	6 26.9	+35 13	1.1	+ 3	0.209	1897
103 Hera	28	10.5	6 28.3	+18 1	1.0	+ 2	0.271	1897
238 Hypatia	28	11.5	6 31.0	+ 4 22	0.9	0	0.266	1894
*153 Hilda	31	13.4	6 42.0	+15 13	0.7	0	0.561	1898
* 56 Melete	31	12.4	6 44.2	+11 25	1.0	+ 1	0.343	1899
165 Loreley	32	11.5	6 49.2	+29 18	0.8	— 2	0.374	1896
136 Austria	36	11.7	7 3.7	+ 6 57	1.0	+ 2	0.173	1898
35 Leukothea . .	36	12.1	7 4.8	+34 20	1.1	+ 1	0.293	1898
55 Pandora . . .	38	10.8	7 12.7	+33 42	1.1	+ 1	0.244	1893
331 Etheridgea . .	40	12.6	7 19.4	+31 10	1.2	+ 3	0.329	1899
27 Euterpe	40	8.6	7 20.0	+22 58	1.1	+ 3	9.989	1899
355 Gabriella . . .	40	12.5	7 23.7	+28 57	1.1	+ 1	0.115	1893
411 [1896 *CJ*] . .	44	13.3	7 37.9	+23 43	0.9	+ 6	0.411	1896
392 Wilhelmina . .	45	12.8	7 43.7	— 1 46	0.8	+ 2	0.375	1894
80 Sappho	46	11.0	7 49.4	+ 6 53	1.0	+ 2	0.174	1896
237 Coelestina . .	48	12.0	7 57.6	+28 34	1.0	+ 5	0.295	1897
407 [1895 *CC*] . .	50	11.9	8 7.3	+19 16	1.1	0	0.223	1899
74 Galatea	56	12.1	8 28.7	+13 12	0.9	+ 4	0.293	1897
91 Aegina	60	12.4	8 46.8	+21 18	1.0	+ 4	0.146	1897

Von den mit einem Sternchen (*) bezeichneten Planeten enthält das Jahrbuch (S. 417 – 455) ausführliche Ephemeriden.

Nicht aufgeführt sind in dieser Tabelle die Oppositionen der Planeten 323, 1894 *BD* und von 441 an, sowie aller Planeten, für welche nur Kreisbahnen berechnet sind.

(113) AMALTHEA 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Jan. 1	9 4 5.27	−31.75	+16 21 18.8	+4 40.0	0.155686	11 53
2	9 3 33.52	33.55	16 25 58.8	4 49.1	0.153354	11 49
3	9 2 59.97	35.31	16 30 47.9	4 57.8	0.151078	11 46
4	9 2 24.66	37.03	16 35 45.7	5 6.2	0.148859	11 42
5	9 1 47.63	−38.73	16 40 51.9	+5 14.5	0.146699	11 39
6	9 1 8.90	40.37	+16 46 6.4	5 22.4	0.144599	11 35
7	9 0 28.53	41.98	16 51 28.8	5 30.0	0.142563	11 32
8	8 59 46.55	43.55	16 56 58.8	5 37.3	0.140592	11 29
9	8 59 3.00	45.06	17 2 36.1	5 44.2	0.138689	11 26
10	8 58 17.94	−46.54	17 8 20.3	+5 50.8	0.136854	11 23
11	8 57 31.40	47.94	+17 14 11.1	5 57.1	0.135090	11 20
12	8 56 43.46	49.31	17 20 8.2	6 2.9	0.133398	11 18
13	8 55 54.15	50.62	17 26 11.1	6 8.3	0.131781	11 15
14	8 55 3.53	51.86	17 32 19.4	6 13.5	0.130240	11 13
15	8 54 11.67	−53.06	17 38 32.9	+6 18.1	0.128776	11 10
16	8 53 18.61	54.18	+17 44 51.0	6 22.3	0.127392	11 8
17	8 52 24.43	55.23	17 51 13.3	6 26.2	0.126089	11 6
18	8 51 29.20	56.22	17 57 39.5	6 29.5	0.124868	11 4
19	8 50 32.98	57.13	18 4 9.0	6 32.4	0.123730	11 3
20	8 49 35.85	−57.97	18 10 41.4	+6 34.8	0.122678	11 1
21	8 48 37.88	58.73	+18 17 16.2	6 36.8	0.121712	11 0
22	8 47 39.15	59.41	18 23 53.0	6 38.4	0.120833	10 58
23	8 46 39.74	60.00	18 30 31.4	6 39.3	0.120043	10 57
24	8 45 39.74	60.51	18 37 10.7	6 39.8	0.119342	10 56
25	8 44 39.23	−60.93	18 43 50.5	+6 39.9	0.118731	10 55
26	8 43 38.30	61.26	+18 50 30.4	6 39.4	0.118212	10 54
☍ 27	8 42 37.04	61.49	18 57 9.8	6 38.5	0.117783	10 54
28	8 41 35.55	61.62	19 3 48.3	6 37.0	0.117447	10 53
29	8 40 33.93	61.68	19 10 25.3	6 35.1	0.117202	10 53
30	8 39 32.25	−61.62	19 17 0.4	+6 32.6	0.117050	10 53
31	8 38 30.63	61.46	+19 23 33.0	6 29.8	0.116990	10 53
Febr. 1	8 37 29.17	61.21	19 30 2.8	6 26.3	0.117022	10 53
2	8 36 27.96	60.87	19 36 29.1	6 22.7	0.117146	10 53
3	8 35 27.09	60.42	19 42 51.8	6 18.4	0.117360	10 53
4	8 34 26.67	−59.89	19 49 10.2	+6 13.8	0.117665	10 54
5	8 33 26.78	59.25	+19 55 24.0	6 8.9	0.118059	10 54
6	8 32 27.53		20 1 32.9		0.118541	10 55

Opp. in AR. Jan. 27 Gröſse = 10.8

W. Luther.

(154) BERTHA 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Jan. 11	9 17 44.98	−52.24	+46 55 39.0	+7 0.2	0.350358	18 37
12	9 16 52.74	53.69	47 2 39.2	6 50.1	0.349610	18 35
13	9 15 59.05	55.09	47 9 29.3	6 39.2	0.348910	18 34
14	9 15 3.96	56.45	47 16 8.5	6 28.0	0.348258	18 32
15	9 14 7.51	−57.75	47 22 36.5	+6 16.5	0.347654	18 30
16	9 13 9.76	58.97	+47 28 53.0	6 4.4	0.347098	18 29
17	9 12 10.79	60.14	47 34 57.4	5 51.8	0.346592	18 28
18	9 11 10.65	61.25	47 40 49.2	5 38.8	0.346136	18 27
19	9 10 9.40	62.30	47 46 28.0	5 25.5	0.345730	18 26
20	9 9 7.10	−63.27	47 51 53.5	+5 11.7	0.345374	18 25
21	9 8 3.83	64.15	+47 57 5.2	4 57.5	0.345069	18 24
22	9 6 59.68	64.96	48 2 2.7	4 42.9	0.344815	18 23
23	9 5 54.72	65.70	48 6 45.6	4 28.0	0.344611	18 23
24	9 4 49.02	66.37	48 11 13.6	4 12.7	0.344459	18 23
25	9 3 42.65	−66.95	48 15 26.3	+3 57.0	0.344358	18 22
26	9 2 35.70	67.43	+48 19 23.3	3 41.1	0.344308	18 22
27	9 1 28.27	67.84	48 23 4.4	3 24.8	0.344309	18 22
28	9 0 20.43	68.16	48 26 29.2	3 8.4	0.344361	18 22
29	8 59 12.27	68.38	48 29 37.6	2 51.6	0.344464	18 22
30	8 58 3.89	−68.52	48 32 29.2	+2 34.6	0.344618	18 23
☍ 31	8 56 55.37	68.56	+48 35 3.8	2 17.6	0.344824	18 23
Febr. 1	8 55 46.81	68.49	48 37 21.4	2 0.4	0.345079	18 24
2	8 54 38.32	68.34	48 39 21.8	1 43.1	0.345383	18 25
3	8 53 29.98	68.11	48 41 4.9	1 25.7	0.345737	18 26
4	8 52 21.87	−67.78	48 42 30.6	+1 8.3	0.346141	18 27
5	8 51 14.09	67.37	+48 43 38.9	0 51.0	0.346593	18 28
6	8 50 6.72	66.87	48 44 29.9	0 33.6	0.347092	18 29
7	8 48 59.85	66.28	48 45 3.5	+0 16.4	0.347638	18 30
8	8 47 53.57	65.62	48 45 19.9	−0 0.8	0.348231	18 32
9	8 46 47.95	−64.88	48 45 19.1	−0 18.0	0.348869	18 34
10	8 45 43.07	64.05	+48 45 1.1	0 34.9	0.349553	18 35
11	8 44 39.02	63.15	48 44 26.2	0 51.7	0.350281	18 37
12	8 43 35.87	62.18	48 43 34.5	1 8.4	0.351053	18 39
13	8 42 33.69	61.15	48 42 26.1	1 24.9	0.351868	18 41
14	8 41 32.54	−60.04	48 41 1.2	−1 41.2	0.352726	18 43
15	8 40 32.50	58.87	+48 39 20.0	1 57.3	0.353626	18 46
16	8 39 33.63		48 37 22.7		0.354566	18 48

Opp. in AR. Jan. 31 Gröſse = 11.2

P. Neugebauer.

(33) POLYHYMNIA 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Jan. 27	10 7 53.61	−43.01	+13 28 36.7	+3 55.3	0.444959	23 9
28	10 7 10.60	43.69	13 32 32.0	3 57.6	0.444263	23 7
29	10 6 26.91	44.33	13 36 29.6	3 59.8	0.443612	23 5
30	10 5 42.58	44.94	13 40 29.4	4 1.7	0.443007	23 3
31	10 4 57.64	−45.51	13 44 31.1	+4 3.4	0.442449	23 1
Febr. 1	10 4 12.13	46.03	+13 48 34.5	4 4.8	0.441938	22 59
2	10 3 26.10	46.53	13 52 39.3	4 6.0	0.441474	22 58
3	10 2 39.57	46.97	13 56 45.3	4 7.0	0.441058	22 56
4	10 1 52.60	47.38	14 0 52.3	4 7.7	0.440691	22 55
5	10 1 5.22	−47.75	14 5 0.0	+4 8.1	0.440373	22 54
6	10 0 17.47	48.08	+14 9 8.1	4 8.4	0.440104	22 53
7	9 59 29.39	48.38	14 13 16.5	4 8.4	0.439884	22 53
8	9 58 41.01	48.62	14 17 24.9	4 8.2	0.439714	22 52
9	9 57 52.39	48.82	14 21 33.1	4 7.8	0.439594	22 52
10	9 57 3.57	−48.99	14 25 40.9	+4 7.1	0.439523	22 52
11	9 56 14.58	49.12	+14 29 48.0	4 6.3	0.439502	22 51
12	9 55 25.46	49.20	14 33 54.3	4 5.2	0.439532	22 52
13	9 54 36.26	49.25	14 37 59.5	4 3.9	0.439612	22 52
☍ 14	9 53 47.01	49.26	14 42 3.4	4 2.4	0.439742	22 52
15	9 52 57.75	−49.22	14 46 5.8	+4 0.6	0.439922	22 52
16	9 52 8.53	49.15	+14 50 6.4	3 58.8	0.440151	22 53
17	9 51 19.38	49.02	14 54 5.2	3 56.6	0.440430	22 54
18	9 50 30.36	48.87	14 58 1.8	3 54.3	0.440759	22 55
19	9 49 41.49	48.66	15 1 56.1	3 51.8	0.441137	22 57
20	9 48 52.83	−48.43	15 5 47.9	+3 49.1	0.441565	22 58
21	9 48 4.40	48.15	+15 9 37.0	3 46.2	0.442041	23 0
22	9 47 16.25	47.83	15 13 23.2	3 43.1	0.442566	23 1
23	9 46 28.42	47.47	15 17 6.3	3 39.9	0.443139	23 3
24	9 45 40.95	47.07	15 20 46.2	3 36.4	0.443760	23 5
25	9 44 53.88	−46.63	15 24 22.6	+3 32.9	0.444428	23 7
26	9 44 7.25	46.15	+15 27 55.5	3 29.1	0.445143	23 9
27	9 43 21.10	45.63	15 31 24.6	3 25.2	0.445904	23 12
28	9 42 35.47	45.07	15 34 49.8	3 21.1	0.446710	23 14
März 1	9 41 50.40	44.48	15 38 10.9	3 16.8	0.447561	23 17
2	9 41 5.92	−43.85	15 41 27.7	+3 12.4	0.448457	23 20
3	9 40 22.07	43.18	+15 44 40.1	3 7.9	0.449396	23 23
4	9 39 38.89		15 47 48.0		0.450378	23 26

Opp. in AR. Febr. 14 Gröſse = 13.3

A. Berberich.

(164) EVA 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
Febr. 11	11h 18m 18s.84	−53s.78	+40° 4′ 45″.5	+8′ 42″.0	0.392490	20m 31s
12	11 17 25.06	54.85	40 13 27.5	8 30.7	0.392443	20 31
13	11 16 30.21	55.85	40 21 58.2	8 19.0	0.392442	20 31
14	11 15 34.36	56.81	40 30 17.2	8 6.7	0.392488	20 31
15	11 14 37.55	−57.72	40 38 23.9	+7 54.0	0.392580	20 31
16	11 13 39.83	58.56	+40 46 17.9	7 41.1	0.392719	20 32
17	11 12 41.27	59.36	40 53 59.0	7 27.6	0.392905	20 32
18	11 11 41.91	60.11	41 1 26.6	7 13.7	0.393137	20 33
19	11 10 41.80	60.79	41 8 40.3	6 59.4	0.393416	20 33
20	11 9 41.01	−61.41	41 15 39.7	+6 44.7	0.393742	20 34
21	11 8 39.60	61.98	+41 22 24.4	6 29.8	0.394113	20 36
22	11 7 37.62	62.48	41 28 54.2	6 14.7	0.394531	20 37
23	11 6 35.14	62.91	41 35 8.9	5 59.0	0.394995	20 38
24	11 5 32.23	63.29	41 41 7.9	5 43.2	0.395504	20 40
25	11 4 28.94	−63.60	41 46 51.1	+5 27.0	0.396058	20 41
26	11 3 25.34	63.84	+41 52 18.1	5 10.6	0.396658	20 43
27	11 2 21.50	64.00	41 57 28.7	4 54.0	0.397303	20 44
28	11 1 17.50	64.10	42 2 22.7	4 37.2	0.397992	20 46
März 1	11 0 13.40	64.13	42 6 59.9	4 20.2	0.398725	20 49
2	10 59 9.27	−64.09	42 11 20.1	+4 3.0	0.399501	20 51
☍ 3	10 58 5.18	63.97	+42 15 23.1	3 45.8	0.400320	20 53
4	10 57 1.21	63.79	42 19 8.9	3 28.5	0.401181	20 56
5	10 55 57.42	63.54	42 22 37.4	3 11.2	0.402083	20 58
6	10 54 53.88	63.22	42 25 48.6	2 53.8	0.403026	21 1
7	10 53 50.66	−62.84	42 28 42.4	+2 36.5	0.404009	21 4
8	10 52 47.82	62.40	+42 31 18.9	2 19.2	0.405032	21 7
9	10 51 45.42	61.90	42 33 38.1	2 2.0	0.406093	21 10
10	10 50 43.52	61.33	42 35 40.1	1 44.7	0.407191	21 13
11	10 49 42.19	60.72	42 37 24.8	1 27.6	0.408327	21 17
12	10 48 41.47	−60.03	42 38 52.4	+1 10.7	0.409499	21 20
13	10 47 41.44	59.30	+42 40 3.1	0 53.8	0.410705	21 24
14	10 46 42.14	58.52	42 40 56.9	0 37.0	0.411946	21 27
15	10 45 43.62	57.69	42 41 33.9	0 20.4	0.413221	21 31
16	10 44 45.93	56.81	42 41 54.3	+0 4.0	0.414529	21 35
17	10 43 49.12	−55.89	42 41 58.3	−0 12.2	0.415870	21 39
18	10 42 53.23	54.88	+42 41 46.1	0 28.4	0.417242	21 43
19	10 41 58.35		42 41 17.7		0.418644	21 47

Opp. in AR. März 3 Gröfse = 12.4

P. Neugebauer.

(19) FORTUNA 1900.

12ʰ Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Febr. 15	11 21 42.50	−46.03	+2 8 54.2	+4 56.6	0.235787	14 18
16	11 20 56.47	47.03	2 13 50.8	5 3.9	0.234729	14 16
17	11 20 9.44	48.00	2 18 54.7	5 11.0	0.233734	14 14
18	11 19 21.44	48.92	2 24 5.7	5 17.9	0.232804	14 12
19	11 18 32.52	−49.76	2 29 23.6	+5 24.3	0.231940	14 10
20	11 17 42.76	50.55	+2 34 47.9	5 30.4	0.231142	14 9
21	11 16 52.21	51.31	2 40 18.3	5 36.2	0.230413	14 8
22	11 16 0.90	52.00	2 45 54.5	5 41.6	0.229754	14 7
23	11 15 8.90	52.62	2 51 36.1	5 46.6	0.229165	14 5
24	11 14 16.28	−53.19	2 57 22.7	+5 51.1	0.228647	14 4
25	11 13 23.09	53.71	+3 3 13.8	5 55.4	0.228200	14 3
26	11 12 29.38	54.16	3 9 9.2	5 59.1	0.227827	14 2
27	11 11 35.22	54.54	3 15 8.3	6 2.4	0.227529	14 2
28	11 10 40.68	54.85	3 21 10.7	6 5.4	0.227304	14 1
März 1	11 9 45.83	−55.08	3 27 16.1	+6 7.8	0.227154	14 1
2	11 8 50.75	55.26	+3 33 23.9	6 9.8	0.227080	14 1
3	11 7 55.49	55.37	3 39 33.7	6 11.3	0.227080	14 1
4	11 7 0.12	55.40	3 45 45.0	6 12.3	0.227156	14 1
☍ 5	11 6 4.72	55.37	3 51 57.3	6 12.9	0.227307	14 1
6	11 5 9.35	−55.27	3 58 10.2	+6 13.1	0.227533	14 2
7	11 4 14.08	55.12	+4 4 23.3	6 12.8	0.227835	14 2
8	11 3 18.96	54.89	4 10 36.1	6 12.3	0.228211	14 3
9	11 2 24.07	54.59	4 16 48.4	6 11.2	0.228662	14 4
10	11 1 29.48	54.24	4 22 59.6	6 9.7	0.229186	14 5
11	11 0 35.24	−53.83	4 29 9.3	+6 7.9	0.229784	14 6
12	10 59 41.41	53.36	+4 35 17.2	6 5.6	0.230457	14 7
13	10 58 48.05	52.82	4 41 22.8	6 3.0	0.231195	14 9
14	10 57 55.23	52.24	4 47 25.8	5 59.8	0.232007	14 10
15	10 57 2.99	51.60	4 53 25.6	5 56.4	0.232891	14 12
16	10 56 11.39	−50.91	4 59 22.0	+5 52.7	0.233843	14 14
17	10 55 20.48	50.15	+5 5 14.7	5 48.5	0.234863	14 16
18	10 54 30.33	49.35	5 11 3.2	5 44.0	0.235950	14 18
19	10 53 40.98	48.51	5 16 47.2	5 39.3	0.237103	14 20
20	10 52 52.47	47.61	5 22 26.5	5 34.2	0.238321	14 23
21	10 52 4.86	−46.65	5 28 0.7	+5 28.8	0.239604	14 25
22	10 51 18.21	45.65	+5 33 29.5	5 23.0	0.240951	14 28
23	10 50 32.56		5 38 52.5		0.242361	14 31

Opp. in AR. März 5 Gröſse = 10.4

P. Neugebauer.

(37) FIDES 1900.

12^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Febr. 19	11 27 16.62	−48.70	+5 47 50.3	+4 20.1	0.217934	13 43
20	11 26 27.92	49.59	5 52 10.4	4 23.9	0.217244	13 42
21	11 25 38.33	50.42	5 56 34.3	4 27.4	0.216624	13 41
22	11 24 47.91	51.20	6 1 1.7	4 30.5	0.216074	13 40
23	11 23 56.71	−51.91	6 5 32.2	+4 33.2	0.215595	13 39
24	11 23 4.80	52.57	+6 10 5.4	4 35.6	0.215188	13 38
25	11 22 12.23	53.15	6 14 41.0	4 37.5	0.214854	13 37
26	11 21 19.08	53.68	6 19 18.5	4 38.9	0.214594	13 37
27	11 20 25.40	54.14	6 23 57.4	4 40.0	0.214409	13 36
28	11 19 31.26	−54.52	6 28 37.4	+4 40.6	0.214299	13 36
März 1	11 18 36.74	54.84	+6 33 18.0	4 40.8	0.214264	13 36
2	11 17 41.90	55.09	6 37 58.8	4 40.6	0.214306	13 36
3	11 16 46.81	55.27	6 42 39.4	4 40.0	0.214423	13 36
4	11 15 51.54	55.37	6 47 19.4	4 38.9	0.214617	13 37
5	11 14 56.17	−55.41	6 51 58.3	+4 37.5	0.214886	13 37
6	11 14 0.76	55.37	+6 56 35.8	4 35.6	0.215232	13 38
☍ 7	11 13 5.39	55.27	7 1 11.4	4 33.3	0.215653	13 39
8	11 12 10.12	55.11	7 5 44.7	4 30.8	0.216150	13 40
9	11 11 15.01	54.87	7 10 15.5	4 27.8	0.216721	13 41
10	11 10 20.14	−54.58	7 14 43.3	+4 24.4	0.217367	13 42
11	11 9 25.56	54.22	+7 19 7.7	4 20.9	0.218086	13 43
12	11 8 31.34	53.80	7 23 28.6	4 16.9	0.218879	13 45
13	11 7 37.54	53.32	7 27 45.5	4 12.6	0.219743	13 46
14	11 6 44.22	52.78	7 31 58.1	4 8.0	0.220679	13 48
15	11 5 51.44	−52.18	7 36 6.1	+4 3.1	0.221685	13 50
16	11 4 59.26	51.52	+7 40 9.2	3 57.9	0.222761	13 52
17	11 4 7.74	50.82	7 44 7.1	3 52.4	0.223906	13 54
18	11 3 16.92	50.05	7 47 59.5	3 46.7	0.225118	13 57
19	11 2 26.87	49.24	7 51 46.2	3 40.7	0.226397	13 59
20	11 1 37.63	−48.37	7 55 26.9	+3 34.5	0.227741	14 2
21	11 0 49.26	47.46	+7 59 1.4	3 28.0	0.229149	14 5
22	11 0 1.80	46.50	8 2 29.4	3 21.3	0.230620	14 7
23	10 59 15.30	45.49	8 5 50.7	3 14.3	0.232153	14 10
24	10 58 29.81	44.44	8 9 5.0	3 7.3	0.233746	14 14
25	10 57 45.37	−43.34	8 12 12.3	+2 59.9	0.235398	14 17
26	10 57 2.03	42.19	+8 15 12.2	2 52.5	0.237107	14 20
27	10 56 19.84		8 18 4.7		0.238873	14 24

Opp. in AR. März 7 Gröfse = 10.4

R. Luther.

(248) LAMEIA 1900.

12h Mittl. Zeit	AR. h m s	Diff. s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Aberr.-Zt. m s
Febr. 21	11 34 29.11	−43.54	−4 15 6.4	+3 32.6	0.176193	12 28
22	11 33 45.57	44.62	4 11 33.8	3 43.8	0.174516	12 25
23	11 33 0.95	45.68	4 7 50.0	3 54.9	0.172905	12 22
24	11 32 15.27	46.70	4 3 55.1	4 5.8	0.171361	12 20
25	11 31 28.57	−47.67	3 59 49.3	+4 16.6	0.169886	12 17
26	11 30 40.90	48.56	−3 55 32.7	4 27.0	0.168482	12 15
27	11 29 52.34	49.38	3 51 5.7	4 36.8	0.167149	12 13
28	11 29 2.96	50.15	3 46 28.9	4 46.6	0.165889	12 10
März 1	11 28 12.81	50.86	3 41 42.3	4 56.0	0.164704	12 8
2	11 27 21.95	−51.48	3 36 46.3	+5 5.0	0.163595	12 7
3	11 26 30.47	52.04	−3 31 41.3	5 13.5	0.162564	12 5
4	11 25 38.43	52.53	3 26 27.8	5 21.7	0.161610	12 3
5	11 24 45.90	52.94	3 21 6.1	5 29.6	0.160735	12 2
6	11 23 52.96	53.28	3 15 36.5	5 37.0	0.159940	12 0
7	11 22 59.68	−53.56	3 9 59.5	+5 43.9	0.159226	11 59
8	11 22 6.12	53.75	−3 4 15.6	5 50.4	0.158592	11 58
☍ 9	11 21 12.37	53.87	2 58 25.2	5 56.5	0.158040	11 57
10	11 20 18.50	53.93	2 52 28.7	6 2.1	0.157571	11 57
11	11 19 24.57	53.92	2 46 26.6	6 7.0	0.157184	11 56
12	11 18 30.65	−53.82	2 40 19.6	+6 11.7	0.156878	11 55
13	11 17 36.83	53.67	−2 34 7.9	6 15.9	0.156655	11 55
14	11 16 43.16	53.44	2 27 52.0	6 19.6	0.156513	11 55
15	11 15 49.72	53.14	2 21 32.4	6 22.7	0.156454	11 55
16	11 14 56.58	52.77	2 15 9.7	6 25.4	0.156476	11 55
17	11 14 3.81	−52.32	2 8 44.3	+6 27.7	0.156579	11 55
18	11 13 11.49	51.81	−2 2 16.6	6 29.5	0.156765	11 55
19	11 12 19.68	51.24	1 55 47.1	6 30.6	0.157032	11 56
20	11 11 28.44	50.61	1 49 16.5	6 31.4	0.157379	11 56
21	11 10 37.83	49.92	1 42 45.1	6 31.6	0.157806	11 57
22	11 9 47.91	−49.16	1 36 13.5	+6 31.3	0.158312	11 58
23	11 8 58.75	48.32	−1 29 42.2	6 30.5	0.158897	11 59
24	11 8 10.43	47.42	1 23 11.7	6 29.4	0.159559	12 0
25	11 7 23.01	46.45	1 16 42.3	6 27.6	0.160297	12 1
26	11 6 36.56	45.42	1 10 14.7	6 25.3	0.161110	12 2
27	11 5 51.14	−44.35	1 3 49.4	+6 22.6	0.161997	12 4
28	11 5 6.79	43.23	−0 57 26.8	6 19.5	0.162958	12 5
29	11 4 23.56		0 51 7.3		0.163992	12 7

Opp. in AR. März 9 Gröfse = 12.9

P. Neugebauer.

(46) HESTIA 1900.

12h Mittl. Zeit	AR. h m s	Diff. s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Aberr.-Zt. m s
März 4	12 19 41.93	−43.42	−2 19 51.2	+5 20.5	0.300607	16 36
5	12 18 58.51	44.28	2 14 30.7	5 26.5	0.299420	16 33
6	12 18 14.23	45.10	2 9 4.2	5 32.1	0.298290	16 30
7	12 17 29.13	45.87	2 3 32.1	5 37.4	0.297218	16 28
8	12 16 43.26	−46.58	1 57 54.7	+5 42.5	0.296205	16 26
9	12 15 56.68	47.26	−1 52 12.2	5 47.2	0.295251	16 24
10	12 15 9.42	47.88	1 46 25.0	5 51.6	0.294358	16 22
11	12 14 21.54	48.47	1 40 33.4	5 55.6	0.293526	16 20
12	12 13 33.07	49.00	1 34 37.8	5 59.3	0.292756	16 18
13	12 12 44.07	−49.47	1 28 38.5	+6 2.7	0.292048	16 16
14	12 11 54.60	49.92	−1 22 35.8	6 5.9	0.291404	16 15
15	12 11 4.68	50.29	1 16 29.9	6 8.7	0.290824	16 13
16	12 10 14.39	50.62	1 10 21.2	6 11.0	0.290308	16 12
17	12 9 23.77	50.91	1 4 10.2	6 13.1	0.289856	16 11
18	12 8 32.86	−51.14	0 57 57.1	+6 14.7	0.289470	16 10
19	12 7 41.72	51.30	−0 51 42.4	6 16.0	0.289149	16 10
20	12 6 50.42	51.42	0 45 26.4	6 16.9	0.288894	16 10
21	12 5 59.00	51.49	0 39 9.5	6 17.4	0.288705	16 9
☍ 22	12 5 7.51	51.50	0 32 52.1	6 17.6	0.288582	16 9
23	12 4 16.01	−51.47	0 26 34.5	+6 17.3	0.288526	16 9
24	12 3 24.54	51.36	−0 20 17.2	6 16.7	0.288536	16 9
25	12 2 33.18	51.22	0 14 0.5	6 15.7	0.288612	16 9
26	12 1 41.96	51.01	0 7 44.8	6 14.2	0.288754	16 9
27	12 0 50.95	50.75	−0 1 30.6	6 12.4	0.288963	16 10
28	12 0 0.20	−50.44	+0 4 41.8	+6 10.2	0.289238	16 10
29	11 59 9.76	50.06	+0 10 52.0	6 7.6	0.289577	16 11
30	11 58 19.70	49.62	0 16 59.6	6 4.6	0.289981	16 12
31	11 57 30.08	49.14	0 23 4.2	6 1.3	0.290449	16 13
April 1	11 56 40.94	48.61	0 29 5.5	5 57.7	0.290981	16 14
2	11 55 52.33	−48.03	0 35 3.2	+5 53.7	0.291577	16 15
3	11 55 4.30	47.38	+0 40 56.9	5 49.4	0.292236	16 17
4	11 54 16.92	46.71	0 46 46.3	5 44.8	0.292955	16 18
5	11 53 30.21	45.99	0 52 31.1	5 39.8	0.293734	16 20
6	11 52 44.22	45.21	0 58 10.9	5 34.3	0.294572	16 22
7	11 51 59.01	−44.37	1 3 45.2	+5 28.4	0.295468	16 24
8	11 51 14.64	43.51	+1 9 13.6	5 22.4	0.296422	16 27
9	11 50 31.13		1 14 36.0		0.297432	16 29

Opp. in AR. März 22 Gröfse = 11.5

P. Neugebauer.

(61) DANAË 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
März 28	13 44 15.93	−49.79	−32 42 39.9	−2 13.1	0.380857	19 58
29	13 43 26.14	50.74	32 44 53.0	2 1.1	0.379484	19 54
30	13 42 35.40	51.66	32 46 54.1	1 49.0	0.378151	19 51
31	13 41 43.74	52.52	32 48 43.1	1 36.8	0.376859	19 47
April 1	13 40 51.22	−53.34	32 50 19.9	−1 24.5	0.375609	19 44
2	13 39 57.88	54.11	−32 51 44.4	1 12.1	0.374401	19 40
3	13 39 3.77	54.83	32 52 56.5	0 59.7	0.373237	19 37
4	13 38 8.94	55.49	32 53 56.2	0 47.3	0.372118	19 34
5	13 37 13.45	56.11	32 54 43.5	0 34.9	0.371044	19 31
6	13 36 17.34	−56.67	32 55 18.4	−0 22.4	0.370015	19 29
7	13 35 20.67	57.18	−32 55 40.8	−0 10.0	0.369033	19 26
8	13 34 23.49	57.63	32 55 50.8	+0 2.5	0.368097	19 23
9	13 33 25.86	58.03	32 55 48.3	0 14.8	0.367208	19 21
10	13 32 27.83	58.38	32 55 33.5	0 27.2	0.366368	19 19
11	13 31 29.45	−58.66	32 55 6.3	+0 39.5	0.365576	19 17
12	13 30 30.79	58.90	−32 54 26.8	0 51.7	0.364834	19 15
13	13 29 31.89	59.07	32 53 35.1	1 3.8	0.364140	19 13
☍ 14	13 28 32.82	59.20	32 52 31.3	1 15.7	0.363496	19 11
15	13 27 33.62	59.27	32 51 15.6	1 27.6	0.362902	19 10
16	13 26 34.35	−59.27	32 49 48.0	+1 39.4	0.362359	19 8
17	13 25 35.08	59.23	−32 48 8.6	1 50.9	0.361866	19 7
18	13 24 35.85	59.13	32 46 17.7	2 2.4	0.361424	19 6
19	13 23 36.72	58.96	32 44 15.3	2 13.5	0.361033	19 5
20	13 22 37.76	58.74	32 42 1.8	2 24.6	0.360694	19 4
21	13 21 39.02	−58.46	32 39 37.2	+2 35.3	0.360407	19 3
22	13 20 40.56	58.13	−32 37 1.9	2 46.0	0.360171	19 3
23	13 19 42.43	57.75	32 34 15.9	2 56.2	0.359987	19 2
24	13 18 44.68	57.30	32 31 19.7	3 6.3	0.359854	19 2
25	13 17 47.38	56.79	32 28 13.4	3 16.1	0.359773	19 1
26	13 16 50.59	−56.22	32 24 57.3	+3 25.4	0.359744	19 1
27	13 15 54.37	55.61	−32 21 31.9	3 34.6	0.359767	19 1
28	13 14 58.76	54.94	32 17 57.3	3 43.4	0.359841	19 2
29	13 14 3.82	54.21	32 14 13.9	3 51.7	0.359966	19 2
30	13 13 9.61	53.43	32 10 22.2	3 59.8	0.360141	19 2
Mai 1	13 12 16.18	−52.61	32 6 22.4	+4 7.5	0.360367	19 3
2	13 11 23.57	51.73	−32 2 14.9	4 14.7	0.360643	19 4
3	13 10 31.84		31 58 0.2		0.360968	19 5

Opp. in AR. April 14 Gröfse = 11.5

R. Luther.

(92) UNDINA 1900.

12ʰ Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
April 10	14 41 24.22	−38.04	−1 48 52.3	+3 57.5	0.366744	19 20
11	14 40 46.18	38.77	1 44 54.8	3 55.5	0.365756	19 17
12	14 40 7.41	39.46	1 40 59.3	3 53.4	0.364816	19 15
13	14 39 27.95	40.13	1 37 5.9	3 51.0	0.363923	19 13
14	14 38 47.82	−40.76	1 33 14.9	+3 48.4	0.363079	19 11
15	14 38 7.06	41.36	−1 29 26.5	3 45.6	0.362284	19 8
16	14 37 25.70	41.93	1 25 40.9	3 42.3	0.361539	19 6
17	14 36 43.77	42.46	1 21 58.6	3 38.8	0.360845	19 4
18	14 36 1.31	42.94	1 18 19.8	3 35.2	0.360204	19 3
19	14 35 18.37	−43.40	1 14 44.6	+3 31.4	0.359615	19 1
20	14 34 34.97	43.82	−1 11 13.2	3 27.4	0.359078	19 0
21	14 33 51.15	44.18	1 7 45.8	3 23.1	0.358593	18 58
22	14 33 6.97	44.51	1 4 22.7	3 18.5	0.358162	18 57
23	14 32 22.46	44.79	1 1 4.2	3 13.8	0.357784	18 56
24	14 31 37.67	−45.04	0 57 50.4	+3 8.9	0.357459	18 55
25	14 30 52.63	45.22	−0 54 41.5	3 3.4	0.357187	18 54
26	14 30 7.41	45.36	0 51 38.1	2 57.8	0.356970	18 54
27	14 29 22.05	45.48	0 48 40.3	2 52.3	0.356806	18 53
28	14 28 36.57	45.54	0 45 48.0	2 46.5	0.356696	18 53
☍ 29	14 27 51.03	−45.55	0 43 1.5	+2 40.2	0.356641	18 53
30	14 27 5.48	45.51	−0 40 21.3	2 33.7	0.356641	18 53
Mai 1	14 26 19.97	45.43	0 37 47.6	2 27.3	0.356696	18 53
2	14 25 34.54	45.31	0 35 20.3	2 20.6	0.356803	18 53
3	14 24 49.23	45.13	0 32 59.7	2 13.7	0.356964	18 53
4	14 24 4.10	−44.92	0 30 46.0	+2 6.6	0.357177	18 54
5	14 23 19.18	44.65	−0 28 39.4	1 59.5	0.357443	18 55
6	14 22 34.53	44.34	0 26 39.9	1 52.2	0.357761	18 55
7	14 21 50.19	44.01	0 24 47.7	1 44.7	0.358132	18 56
8	14 21 6.18	43.62	0 23 3.0	1 37.2	0.358553	18 58
9	14 20 22.56	−43.20	0 21 25.8	+1 29.5	0.359025	18 59
10	14 19 39.36	42.73	−0 19 56.3	1 21.8	0.359547	19 1
11	14 18 56.63	42.23	0 18 34.5	1 13.9	0.360119	19 3
12	14 18 14.40	41.71	0 17 20.6	1 6.0	0.360740	19 4
13	14 17 32.69	41.13	0 16 14.6	0 58.0	0.361409	19 6
14	14 16 51.56	−40.54	0 15 16.6	+0 49.9	0.362124	19 8
15	14 16 11.02	39.92	−0 14 26.7	0 41.8	0.362886	19 10
16	14 15 31.10		0 13 44.9		0.363693	19 12

Opp. in AR. April 29 Gröſse = 11.0

F. Anderson.

(106) DIONE 1900.

12ʰ Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
April 16	15 19 19.51	−37.20	−16 19 45.3	+1 50.0	0.435168	22 38
17	15 18 42.31	37.98	16 17 55.3	1 52.8	0.434054	22 34
18	15 18 4.33	38.76	16 16 2.5	1 55.4	0.432980	22 31
19	15 17 25.57	39.50	16 14 7.1	1 58.0	0.431946	22 28
20	15 16 46.07	−40.20	16 12 9.1	+2 0.4	0.430954	22 25
21	15 16 5.87	40.87	−16 10 8.7	2 2.8	0.430003	22 22
22	15 15 25.00	41.52	16 8 5.9	2 5.1	0.429094	22 19
23	15 14 43.48	42.12	16 6 0.8	2 7.2	0.428228	22 16
24	15 14 1.36	42.68	16 3 53.6	2 9.2	0.427406	22 14
25	15 13 18.68	−43.22	16 1 44.4	+2 11.1	0.426629	22 12
26	15 12 35.46	43.73	−15 59 33.3	2 12.8	0.425897	22 9
27	15 11 51.73	44.19	15 57 20.5	2 14.3	0.425211	22 7
28	15 11 7.54	44.60	15 55 6.2	2 15.8	0.424571	22 5
29	15 10 22.94	44.98	15 52 50.4	2 17.1	0.423977	22 4
30	15 9 37.96	−45.32	15 50 33.3	+2 18.4	0.423431	22 2
Mai 1	15 8 52.64	45.63	−15 48 14.9	2 19.4	0.422933	22 0
2	15 8 7.01	45.88	15 45 55.5	2 20.3	0.422483	21 59
3	15 7 21.13	46.10	15 43 35.2	2 21.0	0.422081	21 58
4	15 6 35.03	46.27	15 41 14.2	2 21.6	0.421727	21 57
5	15 5 48.76	−46.41	15 38 52.6	+2 22.2	0.421421	21 56
6	15 5 2.35	46.51	−15 36 30.4	2 22.6	0.421165	21 55
7	15 4 15.84	46.57	15 34 7.8	2 22.7	0.420957	21 54
☍ 8	15 3 29.27	46.58	15 31 45.1	2 22.8	0.420798	21 54
9	15 2 42.69	46.55	15 29 22.3	2 22.7	0.420688	21 53
10	15 1 56.14	−46.49	15 26 59.6	+2 22.4	0.420626	21 53
11	15 1 9.65	46.39	−15 24 37.2	2 22.1	0.420612	21 53
12	15 0 23.26	46.25	15 22 15.1	2 21.5	0.420647	21 53
13	14 59 37.01	46.07	15 19 53.6	2 20.7	0.420732	21 54
14	14 58 50.94	45.86	15 17 32.9	2 19.8	0.420866	21 54
15	14 58 5.08	−45.61	15 15 13.1	+2 18.9	0.421047	21 55
16	14 57 19.47	45.32	−15 12 54.2	2 17.7	0.421275	21 55
17	14 56 34.15	44.99	15 10 36.5	2 16.4	0.421551	21 56
18	14 55 49.16	44.64	15 8 20.1	2 15.0	0.421875	21 57
19	14 55 4.52	44.23	15 6 5.1	2 13.4	0.422245	21 58
20	14 54 20.29	−43.80	15 3 51.7	+2 11.5	0.422661	21 59
21	14 53 36.49	43.34	−15 1 40.2	2 9.6	0.423124	22 1
22	14 52 53.15		14 59 30.6		0.423633	22 2

Opp. in AR. Mai 8 Gröſse = 12.1

P. Neugebauer.

(79) EURYNOME 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
April 21	15h 21m 28.16s	−47.86s	−16° 12′ 56.1″	+4′ 38.4″	0.290536	16m 13s
22	15 20 40.30	48.76	16 8 17.7	4 41.9	0.289400	16 11
23	15 19 51.54	49.64	16 3 35.8	4 45.6	0.288321	16 9
24	15 19 1.90	50.46	15 58 50.2	4 48.8	0.287300	16 6
25	15 18 11.44	−51.22	15 54 1.4	+4 51.8	0.286337	16 4
26	15 17 20.22	51.92	−15 49 9.6	4 54.6	0.285433	16 3
27	15 16 28.30	52.58	15 44 15.0	4 57.3	0.284591	16 1
28	15 15 35.72	53.18	15 39 17.7	4 59.6	0.283811	15 59
29	15 14 42.54	53.72	15 34 18.1	5 1.7	0.283093	15 57
30	15 13 48.82	−54.21	15 29 16.4	+5 3.5	0.282438	15 56
Mai 1	15 12 54.61	54.64	−15 24 12.9	5 5.2	0.281846	15 55
2	15 11 59.97	54.99	15 19 7.7	5 6.5	0.281318	15 53
3	15 11 4.98	55.30	15 14 1.2	5 7.6	0.280855	15 52
4	15 10 9.68	55.55	15 8 53.6	5 8.3	0.280457	15 52
5	15 9 14.13	−55.72	15 3 45.3	+5 8.9	0.280124	15 51
6	15 8 18.41	55.86	−14 58 36.4	5 9.2	0.279857	15 50
7	15 7 22.55	55.92	14 53 27.2	5 9.2	0.279656	15 50
8	15 6 26.63	55.95	14 48 18.0	5 8.9	0.279520	15 49
☍ 9	15 5 30.68	55.90	14 43 9.1	5 8.3	0.279450	15 49
10	15 4 34.78	−55.80	14 38 0.8	+5 7.5	0.279446	15 49
11	15 3 38.98	55.66	−14 32 53.3	5 6.4	0.279508	15 49
12	15 2 43.32	55.44	14 27 46.9	5 5.1	0.279634	15 50
13	15 1 47.88	55.18	14 22 41.8	5 3.4	0.279825	15 50
14	15 0 52.70	54.85	14 17 38.4	5 1.4	0.280082	15 51
15	14 59 57.85	−54.49	14 12 37.0	+4 59.3	0.280403	15 51
16	14 59 3.36	54.07	−14 7 37.7	4 56.8	0.280787	15 52
17	14 58 9.29	53.58	14 2 40.9	4 54.0	0.281235	15 53
18	14 57 15.71	53.06	13 57 46.9	4 51.0	0.281746	15 54
19	14 56 22.65	52.49	13 52 55.9	4 47.7	0.282320	15 56
20	14 55 30.16	−51.86	13 48 8.2	+4 44.1	0.282955	15 57
21	14 54 38.30	51.18	−13 43 24.1	4 40.2	0.283651	15 58
22	14 53 47.12	50.45	13 38 43.9	4 36.2	0.284408	16 0
23	14 52 56.67	49.68	13 34 7.7	4 31.8	0.285225	16 2
24	14 52 6.99	48.87	13 29 35.9	4 27.3	0.286101	16 4
25	14 51 18.12	−47.98	13 25 8.6	+4 22.4	0.287035	16 6
26	14 50 30.14	47.08	−13 20 46.2	4 17.2	0.288026	16 8
27	14 49 43.06		13 16 29.0		0.289073	16 10

Opp. in AR. Mai 9 Gröfse = 11.5

V. Neugebauer.

(11) PARTHENOPE 1900.

12^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Mai 2	16 10 14.89	−44.89	−13 36 57.9	+2 53.0	0.158535	11 58
3	16 9 30.00	46.16	13 34 4.9	2 52.7	0.156835	11 55
4	16 8 43.84	47.38	13 31 12.2	2 52.1	0.155200	11 52
5	16 7 56.46	48.53	13 28 20.1	2 51.5	0.153632	11 50
6	16 7 7.93	−49.63	13 25 28.6	+2 50.6	0.152133	11 47
7	16 6 18.30	50.68	−13 22 38.0	2 49.5	0.150703	11 45
8	16 5 27.62	51.67	13 19 48.5	2 48.2	0.149344	11 43
9	16 4 35.95	52.58	13 17 0.3	2 46.6	0.148058	11 41
10	16 3 43.37	53.44	13 14 13.7	2 44.9	0.146844	11 39
11	16 2 49.93	−54.24	13 11 28.8	+2 43.0	0.145705	11 37
12	16 1 55.69	54.97	−13 8 45.8	2 40.9	0.144640	11 35
13	16 1 0.72	55.64	13 6 4.9	2 38.4	0.143652	11 34
14	16 0 5.08	56.23	13 3 26.5	2 35.9	0.142741	11 32
15	15 59 8.85	56.75	13 0 50.6	2 33.0	0.141908	11 31
16	15 58 12.10	−57.21	12 58 17.6	+2 30.1	0.141153	11 30
17	15 57 14.89	57.59	−12 55 47.5	2 26.8	0.140477	11 29
18	15 56 17.30	57.90	12 53 20.7	2 23.3	0.139881	11 28
19	15 55 19.40	58.15	12 50 57.4	2 19.6	0.139366	11 27
20	15 54 21.25	58.32	12 48 37.8	2 15.7	0.138931	11 26
☍ 21	15 53 22.93	−58.41	12 46 22.1	+2 11.5	0.138577	11 26
22	15 52 24.52	58.42	−12 44 10.6	2 7.0	0.138305	11 25
23	15 51 26.10	58.35	12 42 3.6	2 2.5	0.138114	11 25
24	15 50 27.75	58.20	12 40 1.1	1 57.6	0.138004	11 25
25	15 49 29.55	57.98	12 38 3.5	1 52.5	0.137976	11 25
26	15 48 31.57	−57.68	12 36 11.0	+1 47.2	0.138030	11 25
27	15 47 33.89	57.29	−12 34 23.8	1 41.7	0.138164	11 25
28	15 46 36.60	56.83	12 32 42.1	1 36.0	0.138379	11 25
29	15 45 39.77	56.29	12 31 6.1	1 30.2	0.138674	11 26
30	15 44 43.48	55.68	12 29 35.9	1 24.0	0.139048	11 26
31	15 43 47.80	−54.99	12 28 11.9	+1 17.8	0.139501	11 27
Juni 1	15 42 52.81	54.23	−12 26 54.1	1 11.4	0.140031	11 28
2	15 41 58.58	53.40	12 25 42.7	1 4.8	0.140637	11 29
3	15 41 5.18	52.51	12 24 37.9	0 58.1	0.141319	11 30
4	15 40 12.67	51.56	12 23 39.8	0 51.2	0.142075	11 31
5	15 39 21.11	−50.54	12 22 48.6	+0 44.2	0.142904	11 33
6	15 38 30.57	49.47	−12 22 4.4	0 37.2	0.143804	11 34
7	15 37 41.10		12 21 27.2		0.144775	11 36

Opp. in AR. Mai 21 Gröfse = 9.1

R. Luther.

(149) MEDUSA 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Mai 11	16 41 29.65	−54.50	−20 37 5.5	+2 6.3	0.128317	11 10
12	16 40 35.15	55.82	20 34 59.2	2 9.1	0.126813	11 8
13	16 39 39.33	57.10	20 32 50.1	2 11.8	0.125381	11 5
14	16 38 42.23	58.28	20 30 38.3	2 14.4	0.124023	11 3
15	16 37 43.95	−59.40	20 28 23.9	+2 16.8	0.122739	11 1
16	16 36 44.55	60.48	−20 26 7.1	2 19.3	0.121531	10 59
17	16 35 44.07	61.47	20 23 47.8	2 21.7	0.120399	10 58
18	16 34 42.60	62.37	20 21 26.1	2 23.9	0.119347	10 56
19	16 33 40.23	63.20	20 19 2.2	2 26.0	0.118375	10 55
20	16 32 37.03	−63.97	20 16 36.2	+2 27.9	0.117485	10 53
21	16 31 33.06	64.66	−20 14 8.3	2 29.8	0.116677	10 52
22	16 30 28.40	65.25	20 11 38.5	2 31.4	0.115952	10 51
23	16 29 23.15	65.74	20 9 7.1	2 32.8	0.115311	10 50
24	16 28 17.41	66.17	20 6 34.3	2 34.2	0.114755	10 50
25	16 27 11.24	−66.50	20 4 0.1	+2 35.4	0.114286	10 49
26	16 26 4.74	66.73	−20 1 24.7	2 36.2	0.113904	10 48
27	16 24 58.01	66.87	19 58 48.5	2 36.9	0.113609	10 48
28	16 23 51.14	66.91	19 56 11.6	2 37.4	0.113402	10 47
☍ 29	16 22 44.23	66.85	19 53 34.2	2 37.8	0.113281	10 47
30	16 21 37.38	−66.71	19 50 56.4	+2 37.8	0.113248	10 47
31	16 20 30.67	66.48	−19 48 18.6	2 37.7	0.113303	10 47
Juni 1	16 19 24.19	66.16	19 45 40.9	2 37.4	0.113445	10 47
2	16 18 18.03	65.74	19 43 3.5	2 36.7	0.113673	10 48
3	16 17 12.29	65.24	19 40 26.8	2 35.9	0.113988	10 48
4	16 16 7.05	−64.67	19 37 50.9	+2 34.8	0.114389	10 49
5	16 15 2.38	64.00	−19 35 16.1	2 33.5	0.114874	10 50
6	16 13 58.38	63.24	19 32 42.6	2 32.0	0.115442	10 50
7	16 12 55.14	62.42	19 30 10.6	2 30.1	0.116094	10 51
8	16 11 52.72	61.54	19 27 40.5	2 28.1	0.116828	10 52
9	16 10 51.18	−60.57	19 25 12.4	+2 25.8	0.117642	10 54
10	16 9 50.61	59.52	−19 22 46.6	2 23.2	0.118536	10 55
11	16 8 51.09	58.42	19 20 23.4	2 20.4	0.119508	10 57
12	16 7 52.67	57.26	19 18 3.0	2 17.5	0.120558	10 58
13	16 6 55.41	56.03	19 15 45.5	2 14.3	0.121682	11 0
14	16 5 59.38	−54.74	19 13 31.2	+2 10.9	0.122880	11 2
15	16 5 4.64	53.39	−19 11 20.3	2 7.3	0.124152	11 4
16	16 4 11.25		19 9 13.0		0.125494	11 6

Opp. in AR. Mai 29 Gröſse = 13.4

P. Neugebauer.

(122) GERDA 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Mai 14	16 55 44.95	−40.77	−20 26 10.6	+1 31.4	0.333203	17 54
15	16 55 4.18	41.59	20 24 39.2	1 32.6	0.332255	17 52
16	16 54 22.59	42.36	20 23 6.6	1 33.6	0.331358	17 50
17	16 53 40.23	43.10	20 21 33.0	1 34.6	0.330511	17 48
18	16 52 57.13	−43.80	20 19 58.4	+1 35.6	0.329716	17 46
19	16 52 13.33	44.45	−20 18 22.8	1 36.4	0.328973	17 44
20	16 51 28.88	45.08	20 16 46.4	1 37.2	0.328283	17 42
21	16 50 43.80	45.66	20 15 9.2	1 38.0	0.327647	17 41
22	16 49 58.14	46.18	20 13 31.2	1 38.6	0.327065	17 39
23	16 49 11.96	−46.66	20 11 52.6	+1 39.2	0.326538	17 38
24	16 48 25.30	47.09	−20 10 13.4	1 39.8	0.326067	17 37
25	16 47 38.21	47.47	20 8 33.6	1 40.2	0.325653	17 36
26	16 46 50.74	47.78	20 6 53.4	1 40.5	0.325295	17 35
27	16 46 2.96	48.06	20 5 12.9	1 40.7	0.324994	17 34
28	16 45 14.90	−48.28	20 3 32.2	+1 40.9	0.324750	17 33
29	16 44 26.62	48.44	−20 1 51.3	1 41.0	0.324564	17 33
30	16 43 38.18	48.56	20 0 10.3	1 41.0	0.324436	17 33
31	16 42 49.62	48.61	19 58 29.3	1 40.9	0.324366	17 33
Juni 1	16 42 1.01	48.62	19 56 48.4	1 40.6	0.324354	17 33
☍ 2	16 41 12.39	−48.57	19 55 7.8	+1 40.3	0.324400	17 33
3	16 40 23.82	48.48	−19 53 27.5	1 39.9	0.324504	17 33
4	16 39 35.34	48.32	19 51 47.6	1 39.4	0.324666	17 33
5	16 38 47.02	48.12	19 50 8.2	1 38.8	0.324885	17 34
6	16 37 58.90	47.87	19 48 29.4	1 38.0	0.325161	17 34
7	16 37 11.03	−47.58	19 46 51.4	+1 37.2	0.325495	17 35
8	16 36 23.45	47.23	−19 45 14.2	1 36.3	0.325885	17 36
9	16 35 36.22	46.84	19 43 37.9	1 35.2	0.326332	17 37
10	16 34 49.38	46.40	19 42 2.7	1 34.0	0.326834	17 38
11	16 34 2.98	45.93	19 40 28.7	1 32.7	0.327391	17 39
12	16 33 17.05	−45.41	19 38 56.0	+1 31.3	0.328003	17 41
13	16 32 31.64	44.84	−19 37 24.7	1 29.9	0.328668	17 43
14	16 31 46.80	44.24	19 35 54.8	1 28.3	0.329387	17 45
15	16 31 2.56	43.60	19 34 26.5	1 26.6	0.330160	17 47
16	16 30 18.96	42.91	19 32 59.9	1 24.7	0.330985	17 49
17	16 29 36.05	−42.17	19 31 35.2	+1 22.7	0.331862	17 51
18	16 28 53.88	41.40	−19 30 12.5	1 20.7	0.332790	17 53
19	16 28 12.48		19 28 51.8		0.333768	17 55

Opp. in AR. Juni 2 Gröſse = 11.3

P. Neugebauer.

(65) CYBELE 1900.

12h Mittl. Zeit		AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
Mai	20	17h 19m 54s.76	−38s.11	−18° 4′ 37″.4	+1′ 15″.5	0.327321	17m 39s
	21	17 19 16.65	38.94	18 3 21.9	1 14.7	0.326304	17 36
	22	17 18 37.71	39.76	18 2 7.2	1 13.9	0.325337	17 34
	23	17 17 57.95	40.51	18 0 53.3	1 13.0	0.324421	17 32
	24	17 17 17.44	−41.22	17 59 40.3	+1 12.0	0.323556	17 30
	25	17 16 36.22	41.90	−17 58 28.3	1 11.1	0.322743	17 28
	26	17 15 54.32	42.57	17 57 17.2	1 10.1	0.321983	17 26
	27	17 15 11.75	43.15	17 56 7.1	1 9.0	0.321278	17 24
	28	17 14 28.60	43.67	17 54 58.1	1 7.8	0.320627	17 23
	29	17 13 44.93	−44.13	17 53 50.3	+1 6.7	0.320031	17 21
	30	17 13 0.80	44.51	−17 52 43.6	1 5.4	0.319491	17 20
	31	17 12 16.29	44.85	17 51 38.2	1 4.0	0.319007	17 19
Juni	1	17 11 31.44	45.18	17 50 34.2	1 2.7	0.318581	17 18
	2	17 10 46.26	45.46	17 49 31.5	1 1.3	0.318211	17 17
	3	17 10 0.80	−45.73	17 48 30.2	+0 59.8	0.317899	17 16
	4	17 9 15.07	45.93	−17 47 30.4	0 58.2	0.317643	17 16
	5	17 8 29.14	46.07	17 46 32.2	0 56.6	0.317445	17 16
	6	17 7 43.07	46.15	17 45 35.6	0 55.0	0.317304	17 16
	7	17 6 56.92	46.17	17 44 40.6	0 53.3	0.317220	17 15
☍	8	17 6 10.75	−46.15	17 43 47.3	+0 51.4	0.317194	17 15
	9	17 5 24.60	46.08	−17 42 55.9	0 49.6	0.317227	17 15
	10	17 4 38.52	45.97	17 42 6.3	0 47.7	0.317317	17 15
	11	17 3 52.55	45.80	17 41 18.6	0 45.7	0.317464	17 16
	12	17 3 6.75	45.60	17 40 32.9	0 43.7	0.317668	17 16
	13	17 2 21.15	−45.36	17 39 49.2	+0 41.6	0.317930	17 16
	14	17 1 35.79	45.05	−17 39 7.6	0 39.4	0.318248	17 17
	15	17 0 50.74	44.72	17 38 28.2	0 37.2	0.318622	17 18
	16	17 0 6.02	44.32	17 37 51.0	0 34.9	0.319052	17 19
	17	16 59 21.70	43.89	17 37 16.1	0 32.6	0.319538	17 20
	18	16 58 37.81	−43.41	17 36 43.5	+0 30.1	0.320079	17 21
	19	16 57 54.40	42.88	−17 36 13.4	0 27.6	0.320675	17 23
	20	16 57 11.52	42.32	17 35 45.8	0 25.1	0.321326	17 24
	21	16 56 29.20	41.71	17 35 20.7	0 22.5	0.322031	17 26
	22	16 55 47.49	41.05	17 34 58.2	0 19.9	0.322789	17 28
	23	16 55 6.44	−40.34	17 34 38.3	+0 17.2	0.323599	17 30
	24	16 54 26.10	39.60	−17 34 21.1	0 14.4	0.324461	17 32
	25	16 53 46.50		17 34 6.7		0.325373	17 34

Opp. in AR. Juni 8 Gröfse = 10.4

P. Neugebauer.

(247) EUKRATE 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Mai 25	17 37 12.55	−77.79	−57 26 29.3	−4 54.6	0.389606	20 23
26	17 35 54.76	79.45	57 31 23.9	4 39.9	0.388645	20 20
27	17 34 35.31	81.03	57 36 3.8	4 24.9	0.387721	20 17
28	17 33 14.28	82.53	57 40 28.7	4 9.5	0.386836	20 15
29	17 31 51.75	−83.94	57 44 38.2	−3 53.8	0.385990	20 12
30	17 30 27.81	85.27	−57 48 32.0	3 37.7	0.385183	20 10
31	17 29 2.54	86.50	57 52 9.7	3 21.3	0.384417	20 8
Juni 1	17 27 36.04	87.63	57 55 31.0	3 4.7	0.383690	20 6
2	17 26 8.41	88.66	57 58 35.7	2 47.8	0.383005	20 4
3	17 24 39.75	−89.59	58 1 23.5	−2 30.7	0.382360	20 2
4	17 23 10.16	90.42	−58 3 54.2	2 13.4	0.381757	20 1
5	17 21 39.74	91.14	58 6 7.6	1 55.9	0.381196	19 59
6	17 20 8.60	91.76	58 8 3.5	1 38.3	0.380676	19 58
7	17 18 36.84	92.26	58 9 41.8	1 20.6	0.380199	19 56
8	17 17 4.58	−92.66	58 11 2.4	−1 2.8	0.379764	19 55
9	17 15 31.92	92.95	−58 12 5.2	0 44.8	0.379371	19 54
☍ 10	17 13 58.97	93.12	58 12 50.0	0 27.0	0.379021	19 53
11	17 12 25.85	93.20	58 13 17.0	−0 9.0	0.378713	19 52
12	17 10 52.65	93.15	58 13 26.0	+0 8.9	0.378449	19 51
13	17 9 19.50	−93.00	58 13 17.1	+0 26.8	0.378227	19 51
14	17 7 46.50	92.74	−58 12 50.3	0 44.6	0.378049	19 50
15	17 6 13.76	92.37	58 12 5.7	1 2.3	0.377913	19 50
16	17 4 41.39	91.90	58 11 3.4	1 20.0	0.377820	19 50
17	17 3 9.49	91.30	58 9 43.4	1 37.4	0.377770	19 50
18	17 1 38.19	−90.62	58 8 6.0	+1 54.9	0.377762	19 50
19	17 0 7.57	89.81	−58 6 11.1	2 11.9	0.377798	19 50
20	16 58 37.76	88.91	58 3 59.2	2 28.9	0.377876	19 50
21	16 57 8.85	87.89	58 1 30.3	2 45.6	0.377997	19 50
22	16 55 40.96	86.78	57 58 44.7	3 2.0	0.378160	19 51
23	16 54 14.18	−85.56	57 55 42.7	+3 18.1	0.378365	19 51
24	16 52 48.62	84.25	−57 52 24.6	3 33.9	0.378612	19 52
25	16 51 24.37	82.84	57 48 50.7	3 49.3	0.378901	19 53
26	16 50 1.53	81.34	57 45 1.4	4 4.5	0.379231	19 54
27	16 48 40.19	79.76	57 40 56.9	4 19.1	0.379602	19 55
28	16 47 20.43	−78.09	57 36 37.8	+4 33.3	0.380013	19 56
29	16 46 2.34	76.36	−57 32 4.5	4 47.2	0.380464	19 57
30	16 44 45.98		57 27 17.3		0.380954	19 58

Opp. in AR. Juni 10 Gröſse = 12.1

W. Luther.

(6) HEBE 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
Juni 9	18h 42m 14s.77	−45s.37	−5° 9′ 22″.4	−1′ 10″.8	0.179673	12m 34s
10	18 41 29.40	46.61	5 10 33.2	1 22.6	0.177687	12 31
11	18 40 42.79	47.81	5 11 55.8	1 34.6	0.175756	12 28
12	18 39 54.98	48.97	5 13 30.4	1 46.6	0.173882	12 25
13	18 39 6.01	−50.08	5 15 17.0	−1 58.9	0.172065	12 22
14	18 38 15.93	51.15	−5 17 15.9	2 11.1	0.170308	12 19
15	18 37 24.78	52.17	5 19 27.0	2 23.4	0.168613	12 16
16	18 36 32.61	53.14	5 21 50.4	2 35.9	0.166980	12 13
17	18 35 39.47	54.06	5 24 26.3	2 48.3	0.165410	12 10
18	18 34 45.41	−54.92	5 27 14.6	−3 0.9	0.163906	12 8
19	18 33 50.49	55.73	−5 30 15.5	3 13.5	0.162468	12 5
20	18 32 54.76	56.47	5 33 29.0	3 26.0	0.161098	12 3
21	18 31 58.29	57.15	5 36 55.0	3 38.6	0.159798	12 1
22	18 31 1.14	57.75	5 40 33.6	3 51.2	0.158569	11 59
23	18 30 3.39	−58.30	5 44 24.8	−4 3.7	0.157411	11 57
24	18 29 5.09	58.78	−5 48 28.5	4 16.2	0.156326	11 55
25	18 28 6.31	59.18	5 52 44.7	4 28.6	0.155314	11 54
26	18 27 7.13	59.50	5 57 13.3	4 40.8	0.154377	11 52
☍ 27	18 26 7.63	59.75	6 1 54.1	4 52.9	0.153515	11 51
28	18 25 7.88	−59.93	6 6 47.0	−5 4.9	0.152729	11 49
29	18 24 7.95	60.03	−6 11 51.9	5 16.8	0.152019	11 48
30	18 23 7.92	60.05	6 17 8.7	5 28.4	0.151386	11 47
Juli 1	18 22 7.87	60.00	6 22 37.1	5 40.0	0.150830	11 46
2	18 21 7.87	59.87	6 28 17.1	5 51.2	0.150351	11 45
3	18 20 8.00	−59.67	6 34 8.3	−6 2.3	0.149949	11 45
4	18 19 8.33	59.39	−6 40 10.6	6 13.1	0.149625	11 44
5	18 18 8.94	59.04	6 46 23.7	6 23.7	0.149377	11 44
6	18 17 9.90	58.63	6 52 47.4	6 34.0	0.149207	11 44
7	18 16 11.27	58.13	6 59 21.4	6 44.2	0.149113	11 43
8	18 15 13.14	−57.58	7 6 5.6	−6 53.9	0.149095	11 43
9	18 14 15.56	56.94	−7 12 59.5	7 3.5	0.149153	11 43
10	18 13 18.62	56.26	7 20 3.0	7 12.8	0.149286	11 44
11	18 12 22.36	55.50	7 27 15.8	7 21.7	0.149494	11 44
12	18 11 26.86	54.68	7 34 37.5	7 30.5	0.149776	11 45
13	18 10 32.18	−53.79	7 42 8.0	−7 38.8	0.150132	11 45
14	18 9 38.39	52.85	−7 49 46.8	7 47.0	0.150560	11 46
15	18 8 45.54		7 57 33.8		0.151060	11 47

Opp. in AR. Juni 27 Gröſse = 8.5

R. Luther.

(288) GLAUKE 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Juni 18	19 17 49.76	−47.88	−19 41 51.4	−2 52.6	0.193120	12 58
19	19 17 1.88	48.89	19 44 44.0	2 55.3	0.192468	12 57
20	19 16 12.99	49.86	19 47 39.3	2 58.0	0.191882	12 56
21	19 15 23.13	50.76	19 50 37.3	3 0.3	0.191364	12 55
22	19 14 32.37	−51.60	19 53 37.6	−3 2.5	0.190914	12 54
23	19 13 40.77	52.38	−19 56 40.1	3 4.5	0.190534	12 54
24	19 12 48.39	53.10	19 59 44.6	3 6.3	0.190224	12 53
25	19 11 55.29	53.74	20 2 50.9	3 7.9	0.189986	12 53
26	19 11 1.55	54.32	20 5 58.8	3 9.3	0.189819	12 53
27	19 10 7.23	−54.82	20 9 8.1	−3 10.5	0.189725	12 52
28	19 9 12.41	55.26	−20 12 18.6	3 11.5	0.189704	12 52
29	19 8 17.15	55.62	20 15 30.1	3 12.2	0.189756	12 52
30	19 7 21.53	55.91	20 18 42.3	3 12.9	0.189882	12 53
Juli 1	19 6 25.62	56.12	20 21 55.2	3 13.3	0.190082	12 53
2	19 5 29.50	−56.27	20 25 8.5	−3 13.5	0.190356	12 53
3	19 4 33.23	56.35	−20 28 22.0	3 13.6	0.190704	12 54
4	19 3 36.88	56.35	20 31 35.6	3 13.4	0.191125	12 55
5	19 2 40.53	56.28	20 34 49.0	3 13.2	0.191620	12 56
☍ 6	19 1 44.25	56.14	20 38 2.2	3 12.8	0.192189	12 57
7	19 0 48.11	−55.93	20 41 15.0	−3 12.1	0.192831	12 58
8	18 59 52.18	55.66	−20 44 27.1	3 11.4	0.193545	12 59
9	18 58 56.52	55.33	20 47 38.5	3 10.6	0.194332	13 0
10	18 58 1.19	54.92	20 50 49.1	3 9.5	0.195191	13 2
11	18 57 6.27	54.46	20 53 58.6	3 8.4	0.196120	13 4
12	18 56 11.81	−53.92	20 57 7.0	−3 7.2	0.197120	13 6
13	18 55 17.89	53.34	−21 0 14.2	3 5.9	0.198188	13 8
14	18 54 24.55	52.69	21 3 20.1	3 4.4	0.199325	13 10
15	18 53 31.86	51.98	21 6 24.5	3 2.9	0.200530	13 12
16	18 52 39.88	51.21	21 9 27.4	3 1.2	0.201803	13 14
17	18 51 48.67	−50.38	21 12 28.6	−2 59.5	0.203142	13 17
18	18 50 58.29	49.50	−21 15 28.1	2 57.6	0.204546	13 19
19	18 50 8.79	48.56	21 18 25.7	2 55.8	0.206014	13 22
20	18 49 20.23	47.57	21 21 21.5	2 53.8	0.207545	13 25
21	18 48 32.66	46.53	21 24 15.3	2 51.7	0.209138	13 28
22	18 47 46.13	−45.41	21 27 7.0	−2 49.7	0.210792	13 31
23	18 47 0.72	44.27	−21 29 56.7	2 47.4	0.212505	13 34
24	18 46 16.45		21 32 44.1		0.214277	13 37

Opp. in AR. Juli 6 Gröſse = 12.1

R. Luther.

(190) ISMENE 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Juli 13	20 45 41.55	−32.68	−11 44 33.4	−2 9.9	0.550014	29 29
14	20 45 8.87	33.10	11 46 43.3	2 13.0	0.549343	29 26
15	20 44 35.77	33.51	11 48 56.3	2 16.1	0.548704	29 24
16	20 44 2.26	33.89	11 51 12.4	2 19.1	0.548098	29 21
17	20 43 28.37	−34.24	11 53 31.5	−2 22.0	0.547526	29 18
18	20 42 54.13	34.58	−11 55 53.5	2 24.9	0.546988	29 16
19	20 42 19.55	34.90	11 58 18.4	2 27.6	0.546484	29 14
20	20 41 44.65	35.18	12 0 46.0	2 30.2	0.546015	29 12
21	20 41 9.47	35.44	12 3 16.2	2 32.7	0.545581	29 10
22	20 40 34.03	−35.67	12 5 48.9	−2 35.1	0.545183	29 9
23	20 39 58.36	35.88	−12 8 24.0	2 37.5	0.544820	29 7
24	20 39 22.48	36.06	12 11 1.5	2 39.8	0.544494	29 6
25	20 38 46.42	36.21	12 13 41.3	2 41.6	0.544204	29 5
26	20 38 10.21	36.33	12 16 22.9	2 43.4	0.543950	29 4
27	20 37 33.88	−36.43	12 19 6.3	−2 45.2	0.543734	29 3
28	20 36 57.45	36.50	−12 21 51.5	2 47.0	0.543554	29 2
☍ 29	20 36 20.95	36.54	12 24 38.5	2 48.8	0.543411	29 2
30	20 35 44.41	36.54	12 27 27.3	2 50.3	0.543305	29 1
31	20 35 7.87	36.52	12 30 17.6	2 51.7	0.543235	29 1
Aug. 1	20 34 31.35	−36.48	12 33 9.3	−2 52.9	0.543203	29 1
2	20 33 54.87	36.40	−12 36 2.2	2 54.1	0.543208	29 1
3	20 33 18.47	36.30	12 38 56.3	2 55.1	0.543250	29 1
4	20 32 42.17	36.18	12 41 51.4	2 56.0	0.543328	29 1
5	20 32 5.99	36.02	12 44 47.4	2 56.9	0.543444	29 2
6	20 31 29.97	−35.84	12 47 44.3	−2 57.6	0.543596	29 2
7	20 30 54.13	35.62	−12 50 41.9	2 58.1	0.543784	29 3
8	20 30 18.51	35.39	12 53 40.0	2 58.6	0.544009	29 4
9	20 29 43.12	35.13	12 56 38.6	2 59.0	0.544270	29 5
10	20 29 7.99	34.84	12 59 37.6	2 59.2	0.544566	29 6
11	20 28 33.15	−34.54	13 2 36.8	−2 59.5	0.544898	29 8
12	20 27 58.61	34.21	−13 5 36.3	2 59.6	0.545265	29 9
13	20 27 24.40	33.85	13 8 35.9	2 59.5	0.545667	29 11
14	20 26 50.55	33.48	13 11 35.4	2 59.4	0.546105	29 12
15	20 26 17.07	33.07	13 14 34.8	2 59.2	0.546577	29 14
16	20 25 44.00	−32.64	13 17 34.0	−2 58.8	0.547083	29 16
17	20 25 11.36	32.18	−13 20 32.8	2 58.4	0.547623	29 19
18	20 24 39.18		13 23 31.2		0.548195	29 21

Opp. in AR. Juli 29 Gröfse = 12.7

P. Neugebauer.

(118) PEITHO 1900.

12^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Juli 11	21 1 49.25	−48.98	−29 8 24.4	−6 1.3	0.238015	14 22
12	21 1 0.27	50.30	29 14 25.7	5 59.5	0.236626	14 19
13	21 0 9.97	51.58	29 20 25.2	5 57.4	0.235294	14 17
14	20 59 18.39	52.81	29 26 22.6	5 54.9	0.234020	14 14
15	20 58 25.58	−53.99	29 32 17.5	−5 51.9	0.232806	14 12
16	20 57 31.59	55.13	−29 38 9.4	5 48.4	0.231653	14 10
17	20 56 36.46	56.23	29 43 57.8	5 44.5	0.230562	14 8
18	20 55 40.23	57.27	29 49 42.3	5 40.2	0.229534	14 6
19	20 54 42.96	58.24	29 55 22.5	5 35.4	0.228570	14 4
20	20 53 44.72	−59.15	30 0 57.9	−5 30.2	0.227671	14 2
21	20 52 45.57	60.01	−30 6 28.1	5 24.6	0.226838	14 0
22	20 51 45.56	60.82	30 11 52.7	5 18.4	0.226072	13 59
23	20 50 44.74	61.55	30 17 11.1	5 12.0	0.225373	13 58
24	20 49 43.19	62.17	30 22 23.1	5 5.0	0.224742	13 57
25	20 48 41.02	−62.76	30 27 28.1	−4 57.8	0.224180	13 56
26	20 47 38.26	63.25	−30 32 25.9	4 50.0	0.223688	13 55
27	20 46 35.01	63.67	30 37 15.9	4 42.0	0.223265	13 54
28	20 45 31.34	64.03	30 41 57.9	4 33.6	0.222912	13 54
29	20 44 27.31	64.30	30 46 31.5	4 24.8	0.222628	13 53
30	20 43 23.01	−64.49	30 50 56.3	−4 15.8	0.222415	13 53
☍ 31	20 42 18.52	64.61	−30 55 12.1	4 6.4	0.222272	13 52
Aug. 1	20 41 13.91	64.64	30 59 18.5	3 56.9	0.222199	13 52
2	20 40 9.27	64.59	31 3 15.4	3 47.0	0.222195	13 52
3	20 39 4.68	64.47	31 7 2.4	3 37.0	0.222261	13 52
4	20 38 0.21	−64.27	31 10 39.4	−3 26.7	0.222396	13 52
5	20 36 55.94	63.99	−31 14 6.1	3 16.3	0.222600	13 52
6	20 35 51.95	63.63	31 17 22.4	3 5.8	0.222872	13 53
7	20 34 48.32	63.20	31 20 28.2	2 55.1	0.223213	13 53
8	20 33 45.12	62.70	31 23 23.3	2 44.2	0.223621	13 54
9	20 32 42.42	−62.13	31 26 7.5	−2 33.3	0.224095	13 55
10	20 31 40.29	61.49	−31 28 40.8	2 22.3	0.224635	13 56
11	20 30 38.80	60.78	31 31 3.1	2 11.3	0.225239	13 57
12	20 29 38.02	60.00	31 33 14.4	2 0.2	0.225908	13 58
13	20 28 38.02	59.15	31 35 14.6	1 49.2	0.226640	14 0
14	20 27 38.87	−58.22	31 37 3.8	−1 38.0	0.227434	14 1
15	20 26 40.65	57.24	−31 38 41.8	1 26.8	0.228290	14 3
16	20 25 43.41		31 40 8.6		0.229206	14 5

Opp. in AR. Juli 31 Gröſse = 11.3

P. Neugebauer.

(226) WERINGIA 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Aug. 22	23 28 57.99	−34.68	−15 36 24.2	−13 11.9	0.132457	11 16
23	23 28 23.31	35.78	15 49 36.1	13 10.6	0.132089	11 16
24	23 27 47.53	36.81	16 2 46.7	13 8.4	0.131795	11 15
25	23 27 10.72	37.75	16 15 55.1	13 5.2	0.131581	11 15
26	23 26 32.97	−38.61	16 29 0.3	−13 0.9	0.131448	11 15
27	23 25 54.36	39.43	−16 42 1.2	12 55.9	0.131398	11 15
28	23 25 14.93	40.24	16 54 57.1	12 50.3	0.131431	11 15
29	23 24 34.69	40.94	17 7 47.4	12 43.8	0.131545	11 15
30	23 23 53.75	41.55	17 20 31.2	12 36.6	0.131741	11 15
31	23 23 12.20	−42.11	17 33 7.8	−12 28.8	0.132020	11 15
Sept. 1	23 22 30.09	42.63	−17 45 36.6	12 20.2	0.132381	11 16
2	23 21 47.46	43.06	17 57 56.8	12 11.0	0.132824	11 17
3	23 21 4.40	43.40	18 10 7.8	12 0.9	0.133350	11 18
4	23 20 21.00	43.67	18 22 8.7	11 50.4	0.133959	11 19
5	23 19 37.33	−43.89	18 33 59.1	−11 38.9	0.134649	11 20
6	23 18 53.44	44.04	−18 45 38.0	11 27.0	0.135420	11 21
7	23 18 9.40	44.14	18 57 5.0	11 14.2	0.136271	11 22
8	23 17 25.26	44.15	19 8 19.2	11 1.2	0.137202	11 23
9	23 16 41.11	44.08	19 19 20.4	10 47.9	0.138211	11 25
☍ 10	23 15 57.03	−43.97	19 30 8.3	−10 33.9	0.139298	11 27
11	23 15 13.06	43.84	−19 40 42.2	10 19.4	0.140462	11 29
12	23 14 29.22	43.59	19 51 1.6	10 4.3	0.141704	11 31
13	23 13 45.63	43.26	20 1 5.9	9 48.6	0.143021	11 33
14	23 13 2.37	42.87	20 10 54.5	9 32.5	0.144412	11 35
15	23 12 19.50	−42.44	20 20 27.0	−9 16.6	0.145876	11 38
16	23 11 37.06	41.92	−20 29 43.6	8 59.9	0.147413	11 40
17	23 10 55.14	41.33	20 38 43.5	8 42.4	0.149020	11 43
18	23 10 13.81	40.69	20 47 25.9	8 25.0	0.150697	11 45
19	23 9 33.12	40.02	20 55 50.9	8 7.5	0.152442	11 48
20	23 8 53.10	−39.25	21 3 58.4	−7 49.6	0.154251	11 51
21	23 8 13.85	38.40	−21 11 48.0	7 31.6	0.156126	11 54
22	23 7 35.45	37.50	21 19 19.6	7 13.3	0.158065	11 57
23	23 6 57.95	36.57	21 26 32.9	6 54.7	0.160067	12 1
24	23 6 21.38	35.57	21 33 27.6	6 36.0	0.162128	12 4
25	23 5 45.81	−34.46	21 40 3.6	−6 17.3	0.164248	12 8
26	23 5 11.35	33.31	−21 46 20.9	5 58.4	0.166425	12 11
27	23 4 38.04		21 52 19.3		0.168656	12 15

Opp. in AR. Sept. 10 Gröſse = 12.3

H. Kreutz.

(24) THEMIS 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Aug. 24	23 46 46.97	−34.64	−2 18 5.1	−3 44.5	0.406453	21 11
25	23 46 12.33	35.37	2 21 49.6	3 49.1	0.405365	21 8
26	23 45 36.96	36.08	2 25 38.7	3 53.5	0.404324	21 5
27	23 45 0.88	36.77	2 29 32.2	3 57.6	0.403324	21 2
28	23 44 24.11	−37.45	2 33 29.8	−4 1.1	0.402368	20 59
29	23 43 46.66	38.09	−2 37 30.9	4 4.5	0.401457	20 56
30	23 43 8.57	38.69	2 41 35.4	4 8.3	0.400592	20 54
31	23 42 29.88	39.24	2 45 43.7	4 11.6	0.399774	20 52
Sept. 1	23 41 50.64	39.76	2 49 55.3	4 14.4	0.399002	20 50
2	23 41 10.88	−40.25	2 54 9.7	−4 17.0	0.398277	20 48
3	23 40 30.63	40.69	−2 58 26.7	4 19.6	0.397600	20 46
4	23 39 49.94	41.12	3 2 46.3	4 21.8	0.396969	20 44
5	23 39 8.82	41.52	3 7 8.1	4 23.9	0.396388	20 42
6	23 38 27.30	41.89	3 11 32.0	4 25.7	0.395858	20 40
7	23 37 45.41	−42.21	3 15 57.7	−4 27.3	0.395377	20 39
8	23 37 3.20	42.48	−3 20 25.0	4 28.9	0.394946	20 38
9	23 36 20.72	42.71	3 24 53.9	4 29.5	0.394565	20 37
10	23 35 38.01	42.93	3 29 23.4	4 30.3	0.394236	20 36
11	23 34 55.08	43.12	3 33 53.7	4 31.0	0.393958	20 35
12	23 34 11.96	−43.26	3 38 24.7	−4 31.7	0.393732	20 34
13	23 33 28.70	43.36	−3 42 56.4	4 31.6	0.393557	20 34
14	23 32 45.34	43.41	3 47 28.0	4 31.5	0.393434	20 33
☍ 15	23 32 1.93	43.43	3 51 59.5	4 31.0	0.393362	20 33
16	23 31 18.50	43.42	3 56 30.5	4 30.3	0.393343	20 33
17	23 30 35.08	−43.35	4 1 0.8	−4 29.4	0.393375	20 34
18	23 29 51.73	43.23	−4 5 30.2	4 28.2	0.393459	20 34
19	23 29 8.50	43.10	4 9 58.4	4 26.8	0.393595	20 34
20	23 28 25.40	42.92	4 14 25.2	4 25.0	0.393784	20 35
21	23 27 42.48	42.70	4 18 50.2	4 22.9	0.394025	20 35
22	23 26 59.78	−42.43	4 23 13.1	−4 20.5	0.394318	20 36
23	23 26 17.35	42.08	−4 27 33.6	4 18.1	0.394664	20 37
24	23 25 35.27	41.74	4 31 51.7	4 15.5	0.395060	20 38
25	23 24 53.53	41.37	4 36 7.2	4 12.4	0.395507	20 39
26	23 24 12.16	40.95	4 40 19.6	4 9.1	0.396004	20 41
27	23 23 31.21	−40.47	4 44 28.7	−4 5.6	0.396551	20 43
28	23 22 50.74	39.96	−4 48 34.3	4 1.9	0.397147	20 45
29	23 22 10.78		4 52 36.2		0.397792	20 47

Opp. in AR. Sept. 15   Gröſse = 11.4

J. Möller.

(108) HECUBA 1900.

12h Mittl. Zeit	AR. h m s	Diff. s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Aberr.-Zt. m s
Aug. 29	23 45 5.31	−38.60	−1 51 18.7	−3 14.3	0.411190	21 25
30	23 44 26.71	39.17	1 54 33.0	3 17.7	0.410412	21 23
31	23 43 47.54	39.72	1 57 50.7	3 20.9	0.409679	21 21
Sept. 1	23 43 7.82	40.24	2 1 11.6	3 23.9	0.408993	21 19
2	23 42 27.58	−40.72	2 4 35.5	−3 26.6	0.408353	21 17
3	23 41 46.86	41.18	−2 8 2.1	3 29.1	0.407760	21 15
4	23 41 5.68	41.61	2 11 31.2	3 31.4	0.407214	21 13
5	23 40 24.07	41.99	2 15 2.6	3 33.7	0.406716	21 12
6	23 39 42.08	42.32	2 18 36.3	3 35.6	0.406267	21 10
7	23 38 59.76	−42.60	2 22 11.9	−3 37.3	0.405867	21 9
8	23 38 17.16	42.83	−2 25 49.2	3 38.8	0.405515	21 8
9	23 37 34.33	43.04	2 29 28.0	3 40.1	0.405213	21 7
10	23 36 51.29	43.23	2 33 8.1	3 41.2	0.404961	21 7
11	23 36 8.06	43.41	2 36 49.3	3 42.0	0.404759	21 6
12	23 35 24.65	−43.58	2 40 31.3	−3 42.8	0.404606	21 6
13	23 34 41.07	43.68	−2 44 14.1	3 43.2	0.404504	21 6
14	23 33 57.39	43.74	2 47 57.3	3 43.4	0.404454	21 5
☍ 15	23 33 13.65	43.74	2 51 40.7	3 43.2	0.404454	21 5
16	23 32 29.91	43.71	2 55 23.9	3 43.0	0.404504	21 5
17	23 31 46.20	−43.63	2 59 6.9	−3 42.4	0.404606	21 6
18	23 31 2.57	43.52	−3 2 49.3	3 41.7	0.404760	21 6
19	23 30 19.05	43.36	3 6 31.0	3 40.7	0.404964	21 7
20	23 29 35.69	43.18	3 10 11.7	3 39.4	0.405219	21 8
21	23 28 52.51	42.94	3 13 51.1	3 37.9	0.405525	21 8
22	23 28 9.57	−42.68	3 17 29.0	−3 36.2	0.405881	21 9
23	23 27 26.89	42.36	−3 21 5.2	3 34.2	0.406287	21 11
24	23 26 44.53	42.00	3 24 39.4	3 32.0	0.406744	21 12
25	23 26 2.53	41.62	3 28 11.4	3 29.5	0.407250	21 14
26	23 25 20.91	41.20	3 31 40.9	3 26.9	0.407804	21 15
27	23 24 39.71	−40.74	3 35 7.8	−3 24.1	0.408407	21 17
28	23 23 58.97	40.24	−3 38 31.9	3 21.0	0.409059	21 19
29	23 23 18.73	39.72	3 41 52.9	3 17.6	0.409759	21 21
30	23 22 39.01	39.16	3 45 10.5	3 14.2	0.410506	21 23
Oct. 1	23 21 59.85	38.54	3 48 24.7	3 10.7	0.411298	21 25
2	23 21 21.31	−37.88	3 51 35.4	−3 7.1	0.412134	21 28
3	23 20 43.43	37.20	−3 54 42.5	3 3.3	0.413013	21 30
4	23 20 6.23		3 57 45.8		0.413935	21 33

Opp. in AR. Sept. 15 Gröfse = 12.2

P. Neugebauer.

(82) ALKMENE 1900.

12h Mittl. Zeit	AR. h m s	Diff. s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Aberr.-Zt. m s
Aug. 25	23 54 38.81	−38.06	−3 13 13.8	−3 58.7	0.353671	18 45
26	23 54 0.75	38.98	3 17 12.5	4 3.3	0.352295	18 42
27	23 53 21.77	39.86	3 21 15.8	4 7.8	0.350964	18 38
28	23 52 41.91	40.72	3 25 23.6	4 12.1	0.349680	18 35
29	23 52 1.19	−41.54	3 29 35.7	−4 16.0	0.348443	18 32
30	23 51 19.65	42.33	−3 33 51.7	4 19.7	0.347256	18 29
31	23 50 37.32	43.07	3 38 11.4	4 23.2	0.346118	18 26
Sept. 1	23 49 54.25	43.79	3 42 34.6	4 26.4	0.345030	18 23
2	23 49 10.46	44.47	3 47 1.0	4 29.5	0.343994	18 21
3	23 48 25.99	−45.11	3 51 30.5	−4 32.1	0.343009	18 18
4	23 47 40.88	45.71	−3 56 2.6	4 34.6	0.342078	18 16
5	23 46 55.17	46.27	4 0 37.2	4 36.7	0.341200	18 13
6	23 46 8.90	46.79	4 5 13.9	4 38.7	0.340377	18 11
7	23 45 22.11	47.27	4 9 52.6	4 40.3	0.339608	18 9
8	23 44 34.84	−47.71	4 14 32.9	−4 41.6	0.338895	18 8
9	23 43 47.13	48.11	−4 19 14.5	4 42.8	0.338238	18 6
10	23 42 59.02	48.47	4 23 57.3	4 43.6	0.337637	18 5
11	23 42 10.55	48.78	4 28 40.9	4 44.0	0.337093	18 3
12	23 41 21.77	49.06	4 33 24.9	4 44.4	0.336607	18 2
13	23 40 32.71	−49.28	4 38 9.3	−4 44.2	0.336179	18 1
14	23 39 43.43	49.47	−4 42 53.5	4 43.9	0.335810	18 0
15	23 38 53.96	49.59	4 47 37.4	4 43.3	0.335499	17 59
☍ 16	23 38 4.37	49.68	4 52 20.7	4 42.2	0.335247	17 59
17	23 37 14.69	49.72	4 57 2.9	4 41.0	0.335055	17 58
18	23 36 24.97	−49.70	5 1 43.9	−4 39.3	0.334921	17 58
19	23 35 35.27	49.64	−5 6 23.2	4 37.4	0.334848	17 58
20	23 34 45.63	49.53	5 11 0.6	4 35.2	0.334833	17 58
21	23 33 56.10	49.36	5 15 35.8	4 32.7	0.334879	17 58
22	23 33 6.74	49.14	5 20 8.5	4 29.8	0.334983	17 58
23	23 32 17.60	−48.88	5 24 38.3	−4 26.7	0.335146	17 58
24	23 31 28.72	48.56	−5 29 5.0	4 23.2	0.335369	17 59
25	23 30 40.16	48.20	5 33 28.2	4 19.6	0.335649	18 0
26	23 29 51.96	47.80	5 37 47.8	4 15.6	0.335988	18 1
27	23 29 4.16	47.33	5 42 3.4	4 11.3	0.336384	18 2
28	23 28 16.83	−46.82	5 46 14.7	−4 6.8	0.336837	18 3
29	23 27 30.01	46.28	−5 50 21.5	4 2.1	0.337346	18 4
30	23 26 43.73		5 54 23.6		0.337911	18 5

Opp. in AR. Sept. 16 Gröfse = 12.0

W. Luther.

(241) GERMANIA 1900.

12ʰ Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Sept. 15	0 9 5.40	−44.14	+10 18 22.2	−3 56.0	0.253123	14 53
16	0 8 21.26	44.55	10 14 26.2	4 4.1	0.252538	14 52
17	0 7 36.71	44.90	10 10 22.1	4 12.0	0.252016	14 51
18	0 6 51.81	45.20	10 6 10.1	4 19.5	0.251559	14 50
19	0 6 6.61	−45.45	10 1 50.6	−4 26.8	0.251166	14 49
20	0 5 21.16	45.63	+ 9 57 23.8	4 33.7	0.250840	14 48
21	0 4 35.53	45.76	9 52 50.1	4 40.3	0.250580	14 48
22	0 3 49.77	45.83	9 48 9.8	4 46.6	0.250386	14 47
☍ 23	0 3 3.94	45.84	9 43 23.2	4 52.6	0.250259	14 47
24	0 2 18.10	−45.79	9 38 30.6	−4 58.0	0.250200	14 47
25	0 1 32.31	45.69	+ 9 33 32.6	5 3.2	0.250208	14 47
26	0 0 46.62	45.52	9 28 29.4	5 8.0	0.250284	14 47
27	0 0 1.10	45.30	9 23 21.4	5 12.4	0.250428	14 47
28	23 59 15.80	45.02	9 18 9.0	5 16.4	0.250639	14 48
29	23 58 30.78	−44.69	9 12 52.6	−5 20.0	0.250917	14 48
30	23 57 46.09	44.30	+ 9 7 32.6	5 23.2	0.251263	14 49
Oct. 1	23 57 1.79	43.85	9 2 9.4	5 25.9	0.251675	14 50
2	23 56 17.94	43.36	8 56 43.5	5 28.4	0.252154	14 51
3	23 55 34.58	42.81	8 51 15.1	5 30.4	0.252699	14 52
4	23 54 51.77	−42.22	8 45 44.7	−5 31.9	0.253309	14 53
5	23 54 9.55	41.57	+ 8 40 12.8	5 33.2	0.253983	14 55
6	23 53 27.98	40.89	8 34 39.6	5 34.0	0.254722	14 56
7	23 52 47.09	40.15	8 29 5.6	5 34.4	0.255524	14 58
8	23 52 6.94	39.38	8 23 31.2	5 34.4	0.256389	15 0
9	23 51 27.56	−38.56	8 17 56.8	−5 34.2	0.257316	15 2
10	23 50 49.00	37.70	+ 8 12 22.6	5 33.4	0.258304	15 4
11	23 50 11.30	36.81	8 6 49.2	5 32.4	0.259352	15 6
12	23 49 34.49	35.86	8 1 16.8	5 30.9	0.260459	15 8
13	23 48 58.63	34.89	7 55 45.9	5 29.0	0.261625	15 10
14	23 48 23.74	−33.87	7 50 16.9	−5 26.9	0.262849	15 13
15	23 47 49.87	32.82	+ 7 44 50.0	5 24.3	0.264129	15 16
16	23 47 17.05	31.74	7 39 25.7	5 21.3	0.265465	15 19
17	23 46 45.31	30.61	7 34 4.4	5 18.0	0.266856	15 22
18	23 46 14.70	29.46	7 28 46.4	5 14.4	0.268299	15 25
19	23 45 45.24	−28.27	7 23 32.0	−5 10.4	0.269795	15 28
20	23 45 16.97	27.06	+ 7 18 21.6	5 6.1	0.271342	15 31
21	23 44 49.91		7 13 15.5		0.272938	15 35

Opp. in AR. Sept. 23 Gröſse = 10.7

W. Luther.

(270) ANAHITA 1900.

12^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
Sept. 19	0ʰ 56ᵐ 54ˢ.76	−46ˢ.68	+10° 54′ 44″.3	−4′ 46″.2	9.973252	7ᵐ 49ˢ
20	0 56 8.08	47.94	10 49 58.1	4 59.1	9.972193	7 48
21	0 55 20.14	49.12	10 44 59.0	5 11.5	9.971228	7 47
22	0 54 31.02	50.20	10 39 47.5	5 23.4	9.970360	7 46
23	0 53 40.82	−51.20	10 34 24.1	−5 34.8	9.969591	7 45
24	0 52 49.62	52.10	+10 28 49.3	5 45.7	9.968923	7 45
25	0 51 57.52	52.90	10 23 3.6	5 56.0	9.968357	7 44
26	0 51 4.62	53.59	10 17 7.6	6 5.7	9.967894	7 43
27	0 50 11.03	54.20	10 11 1.9	6 14.9	9.967536	7 43
28	0 49 16.83	−54.67	10 4 47.0	−6 23.5	9.967284	7 43
29	0 48 22.16	55.06	+ 9 58 23.5	6 31.4	9.967138	7 43
30	0 47 27.10	55.35	9 51 52.1	6 38.6	9.967100	7 43
Oct. 1	0 46 31.75	55.52	9 45 13.5	6 45.1	9.967170	7 43
2	0 45 36.23	55.58	9 38 28.4	6 51.0	9.967348	7 43
3	0 44 40.65	−55.54	9 31 37.4	−6 56.2	9.967636	7 43
4	0 43 45.11	55.40	+ 9 24 41.2	7 0.6	9.968032	7 44
☍ 5	0 42 49.71	55.18	9 17 40.6	7 4.3	9.968536	7 44
6	0 41 54.53	54.85	9 10 36.3	7 7.3	9.969148	7 45
7	0 40 59.68	54.44	9 3 29.0	7 9.7	9.969867	7 45
8	0 40 5.24	−53.92	8 56 19.3	−7 11.3	9.970693	7 46
9	0 39 11.32	53.32	+ 8 49 8.0	7 12.2	9.971626	7 47
10	0 38 18.00	52.63	8 41 55.8	7 12.4	9.972665	7 49
11	0 37 25.37	51.84	8 34 43.4	7 12.0	9.973809	7 50
12	0 36 33.53	50.95	8 27 31.4	7 10.8	9.975056	7 51
13	0 35 42.58	−49.99	8 20 20.6	−7 8.8	9.976406	7 52
14	0 34 52.59	48.95	+ 8 13 11.8	7 6.2	9.977857	7 54
15	0 34 3.64	47.81	8 6 5.6	7 2.9	9.979409	7 56
16	0 33 15.83	46.60	7 59 2.7	6 58.9	9.981059	7 58
17	0 32 29.23	45.31	7 52 3.8	6 54.1	9.982806	8 0
18	0 31 43.92	−43.96	7 45 9.7	−6 48.8	9.984648	8 2
19	0 30 59.96	42.50	+ 7 38 20.9	6 42.7	9.986583	8 4
20	0 30 17.46	40.99	7 31 38.2	6 36.1	9.988609	8 6
21	0 29 36.47	39.41	7 25 2.1	6 28.8	9.990725	8 8
22	0 28 57.06	37.78	7 18 33.3	6 21.1	9.992927	8 11
23	0 28 19.28	−36.09	7 12 12.2	−6 12.6	9.995213	8 13
24	0 27 43.19	34.33	+ 7 5 59.6	6 3.7	9.997581	8 16
25	0 27 8.86		6 59 55.9		0.000028	8 19

Opp. in AR. Oct. 5 Gröſse = 10.2

V. Neugebauer.

(178) BELISANA 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Sept. 28	1 49 10.54	−45.82	+9 32 25.2	−3 51.2	0.191724	12 55
29	1 48 24.72	46.95	9 28 34.0	3 56.6	0.190520	12 53
30	1 47 37.77	48.03	9 24 37.4	4 2.3	0.189382	12 51
Oct. 1	1 46 49.74	49.05	9 20 35.1	4 7.3	0.188311	12 49
2	1 46 0.69	−50.00	9 16 27.8	−4 12.0	0.187309	12 47
3	1 45 10.69	50.89	+9 12 15.8	4 16.6	0.186377	12 46
4	1 44 19.80	51.74	9 7 59.2	4 20.8	0.185516	12 44
5	1 43 28.06	52.53	9 3 38.4	4 24.6	0.184727	12 43
6	1 42 35.53	53.25	8 59 13.8	4 28.2	0.184011	12 41
7	1 41 42.28	−53.90	8 54 45.6	−4 31.5	0.183369	12 40
8	1 40 48.38	54.50	+8 50 14.1	4 34.4	0.182802	12 39
9	1 39 53.88	55.04	8 45 39.7	4 37.0	0.182310	12 39
10	1 38 58.84	55.50	8 41 2.7	4 39.3	0.181895	12 38
11	1 38 3.34	55.89	8 36 23.4	4 41.0	0.181557	12 37
12	1 37 7.45	−56.24	8 31 42.4	−4 42.4	0.181298	12 37
13	1 36 11.21	56.51	+8 27 0.0	4 43.6	0.181117	12 36
14	1 35 14.70	56.71	8 22 16.4	4 44.3	0.181015	12 36
15	1 34 17.99	56.83	8 17 32.1	4 44.7	0.180993	12 36
16	1 33 21.16	56.88	8 12 47.4	4 44.7	0.181050	12 36
17	1 32 24.28	−56.86	8 8 2.7	−4 44.1	0.181188	12 37
☍ 18	1 31 27.42	56.76	+8 3 18.6	4 43.0	0.181405	12 37
19	1 30 30.66	56.60	7 58 35.6	4 41.8	0.181703	12 38
20	1 29 34.06	56.35	7 53 53.8	4 40.3	0.182080	12 38
21	1 28 37.71	56.03	7 49 13.5	4 38.1	0.182538	12 39
22	1 27 41.68	−55.64	7 44 35.4	−4 35.4	0.183075	12 40
23	1 26 46.04	55.18	+7 40 0.0	4 32.3	0.183691	12 41
24	1 25 50.86	54.63	7 35 27.7	4 28.8	0.184385	12 42
25	1 24 56.23	54.03	7 30 58.9	4 25.0	0.185157	12 44
26	1 24 2.20	53.37	7 26 33.9	4 21.1	0.186005	12 45
27	1 23 8.83	−52.63	7 22 12.8	−4 16.7	0.186929	12 47
28	1 22 16.20	51.80	+7 17 56.1	4 11.7	0.187929	12 48
29	1 21 24.40	50.94	7 13 44.4	4 6.4	0.189001	12 50
30	1 20 33.46	50.04	7 9 38.0	4 0.9	0.190146	12 52
31	1 19 43.42	49.06	7 5 37.1	3 54.9	0.191362	12 54
Nov. 1	1 18 54.36	−48.02	7 1 42.2	−3 48.7	0.192648	12 57
2	1 18 6.34	46.94	+6 57 53.5	3 42.0	0.194002	12 59
3	1 17 19.40		6 54 11.5		0.195423	13 2

Opp. in AR. Oct. 18 Grösse = 12.1

V. Neugebauer.

(17) THETIS 1900.

12^h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Sept. 30	2 5 42.75	−44.13	+3 36 15.6	−5 59.4	0.217842	13 43
Oct. 1	2 4 58.62	45.22	3 30 16.2	6 0.8	0.216926	13 41
2	2 4 13.40	46.26	3 24 15.4	6 2.0	0.216074	13 40
3	2 3 27.14	47.26	3 18 13.4	6 2.9	0.215288	13 38
4	2 2 39.88	−48.19	3 12 10.5	−6 3.2	0.214568	13 37
5	2 1 51.69	49.08	+3 6 7.3	6 3.1	0.213915	13 36
6	2 1 2.61	49.92	3 0 4.2	6 2.7	0.213331	13 35
7	2 0 12.69	50.70	2 54 1.5	6 1.9	0.212816	13 34
8	1 59 21.99	51.42	2 47 59.6	6 0.7	0.212371	13 33
9	1 58 30.57	−52.10	2 41 58.9	−5 59.1	0.211997	13 32
10	1 57 38.47	52.72	+2 35 59.8	5 57.2	0.211694	13 31
11	1 56 45.75	53.26	2 30 2.6	5 54.8	0.211464	13 31
12	1 55 52.49	53.75	2 24 7.8	5 52.0	0.211307	13 31
13	1 54 58.74	54.18	2 18 15.8	5 48.9	0.211223	13 31
14	1 54 4.56	−54.57	2 12 26.9	−5 45.2	0.211212	13 31
15	1 53 9.99	54.88	+2 6 41.7	5 41.1	0.211275	13 31
16	1 52 15.11	55.10	2 1 0.6	5 36.7	0.211412	13 31
17	1 51 20.01	55.26	1 55 23.9	5 31.8	0.211624	13 31
18	1 50 24.75	55.35	1 49 52.1	5 26.4	0.211912	13 32
19	1 49 29.40	−55.36	1 44 25.7	−5 20.8	0.212277	13 33
20	1 48 34.04	55.32	+1 39 4.9	5 14.8	0.212720	13 33
21	1 47 38.72	55.22	1 33 50.1	5 8.4	0.213238	13 34
☍ 22	1 46 43.50	55.05	1 28 41.7	5 1.5	0.213829	13 35
23	1 45 48.45	54.81	1 23 40.2	4 54.3	0.214493	13 37
24	1 44 53.64	−54.51	1 18 45.9	−4 46.8	0.215230	13 38
25	1 43 59.13	54.13	+1 13 59.1	4 39.0	0.216041	13 40
26	1 43 5.00	53.68	1 9 20.1	4 30.7	0.216924	13 41
27	1 42 11.32	53.16	1 4 49.4	4 22.2	0.217879	13 43
28	1 41 18.16	52.60	1 0 27.2	4 13.6	0.218905	13 45
29	1 40 25.56	−51.97	0 56 13.6	−4 4.5	0.220000	13 47
30	1 39 33.59	51.26	+0 52 9.1	3 55.1	0.221164	13 49
31	1 38 42.33	50.53	0 48 14.0	3 45.6	0.222396	13 52
Nov. 1	1 37 51.80	49.74	0 44 28.4	3 36.0	0.223694	13 54
2	1 37 2.06	48.89	0 40 52.4	3 26.1	0.225057	13 57
3	1 36 13.17	−47.96	0 37 26.3	−3 15.9	0.226483	14 0
4	1 35 25.21	46.95	+0 34 10.4	3 5.5	0.227971	14 3
5	1 34 38.26		0 31 4.9		0.229521	14 5

Opp. in AR. Oct. 22 Gröfse = 10.4

P. Neugebauer.

(176) IDUNNA 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Oct. 24	3 18 27.37	−37.13	+4 31 53.9	−12 45.4	0.230185	14 7
25	3 17 50.24	37.97	4 19 8.5	12 42.7	0.229537	14 6
26	3 17 12.27	38.76	4 6 25.8	12 39.5	0.228958	14 4
27	3 16 33.51	39.48	3 53 46.3	12 35.7	0.228450	14 3
28	3 15 54.03	−40.16	3 41 10.6	−12 31.2	0.228013	14 3
29	3 15 13.87	40.77	+3 28 39.4	12 26.4	0.227647	14 2
30	3 14 33.10	41.33	3 16 13.0	12 20.8	0.227353	14 1
31	3 13 51.77	41.83	3 3 52.2	12 14.8	0.227132	14 1
Nov. 1	3 13 9.94	42.28	2 51 37.4	12 8.1	0.226984	14 1
2	3 12 27.66	−42.67	2 39 29.3	−12 0.9	0.226909	14 1
3	3 11 44.99	43.01	+2 27 28.4	11 53.1	0.226906	14 1
4	3 11 1.98	43.29	2 15 35.3	11 44.9	0.226977	14 1
5	3 10 18.69	43.49	2 3 50.4	11 36.2	0.227121	14 1
6	3 9 35.20	43.65	1 52 14.2	11 26.9	0.227337	14 1
7	3 8 51.55	−43.76	1 40 47.3	−11 17.1	0.227627	14 2
8	3 8 7.79	43.82	+1 29 30.2	11 6.9	0.227989	14 3
9	3 7 23.97	43.80	1 18 23.3	10 56.2	0.228423	14 3
10	3 6 40.17	43.73	1 7 27.1	10 45.0	0.228929	14 4
☍ 11	3 5 56.44	43.62	0 56 42.1	10 33.4	0.229507	14 5
12	3 5 12.82	−43.44	0 46 8.7	−10 21.2	0.230156	14 7
13	3 4 29.38	43.20	+0 35 47.5	10 8.8	0.230875	14 8
14	3 3 46.18	42.89	0 25 38.7	9 55.8	0.231664	14 10
15	3 3 3.29	42.54	0 15 42.9	9 42.4	0.232522	14 11
16	3 2 20.75	42.12	+0 6 0.5	9 28.8	0.233449	14 13
17	3 1 38.63	−41.66	−0 3 28.3	− 9 14.8	0.234443	14 15
18	3 0 56.97	41.12	−0 12 43.1	9 0.6	0.235503	14 17
19	3 0 15.85	40.54	0 21 43.7	8 46.2	0.236629	14 19
20	2 59 35.31	39.90	0 30 29.9	8 31.3	0.237819	14 22
21	2 58 55.41	39.22	0 39 1.2	8 16.1	0.239073	14 24
22	2 58 16.19	−38.47	0 47 17.3	− 8 0.7	0.240388	14 27
23	2 57 37.72	37.67	−0 55 18.0	7 44.9	0.241764	14 30
24	2 57 0.05	36.85	1 3 2.9	7 29.1	0.243199	14 33
25	2 56 23.20	35.97	1 10 32.0	7 13.2	0.244692	14 36
26	2 55 47.23	35.05	1 17 45.2	6 57.4	0.246242	14 39
27	2 55 12.18	−34.07	1 24 42.6	− 6 41.5	0.247846	14 42
28	2 54 38.11	33.06	−1 31 24.1	6 25.5	0.249500	14 45
29	2 54 5.05		1 37 49.6		0.251203	14 49

Opp. in AR. Nov. 11 · Gröſse = 10.2

P. Neugebauer.

(76) FREIA 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Oct. 26	3 25 42.79	−39.20	+17 56 48.7	−3 9.6	0.299992	16 35
27	3 25 3.59	40.06	17 53 39.1	3 13.3	0.298796	16 32
28	3 24 23.53	40.88	17 50 25.8	3 16.8	0.297655	16 29
29	3 23 42.65	41.66	17 47 9.0	3 20.1	0.296570	16 27
30	3 23 0.99	−42.38	17 43 48.9	−3 23.2	0.295543	16 24
31	3 22 18.61	43.05	+17 40 25.7	3 26.1	0.294574	16 22
Nov. 1	3 21 35.56	43.68	17 36 59.6	3 28.9	0.293663	16 20
2	3 20 51.88	44.24	17 33 30.7	3 31.5	0.292812	16 18
3	3 20 7.64	44.77	17 29 59.2	3 33.9	0.292021	16 16
4	3 19 22.87	−45.24	17 26 25.3	−3 36.1	0.291291	16 15
5	3 18 37.63	45.65	+17 22 49.2	3 38.2	0.290623	16 13
6	3 17 51.98	46.02	17 19 11.0	3 39.9	0.290017	16 12
7	3 17 5.96	46.33	17 15 31.1	3 41.5	0.289473	16 10
8	3 16 19.63	46.60	17 11 49.6	3 42.9	0.288993	16 9
9	3 15 33.03	−46.82	17 8 6.7	−3 44.1	0.288577	16 8
10	3 14 46.21	46.97	+17 4 22.6	3 45.1	0.288224	16 8
11	3 13 59.24	47.07	17 0 37.5	3 45.8	0.287935	16 7
12	3 13 12.17	47.11	16 56 51.7	3 46.2	0.287711	16 7
☍ 13	3 12 25.06	47.10	16 53 5.5	3 46.3	0.287552	16 6
14	3 11 37.96	−47.02	16 49 19.2	−3 46.3	0.287459	16 6
15	3 10 50.94	46.90	+16 45 32.9	3 46.1	0.287431	16 6
16	3 10 4.04	46.71	16 41 46.8	3 45.5	0.287468	16 6
17	3 9 17.33	46.46	16 38 1.3	3 44.6	0.287570	16 6
18	3 8 30.87	46.16	16 34 16.7	3 43.6	0.287738	16 7
19	3 7 44.71	−45.80	16 30 33.1	−3 42.2	0.287970	16 7
20	3 6 58.91	45.37	+16 26 50.9	3 40.5	0.288267	16 8
21	3 6 13.54	44.88	16 23 10.4	3 38.6	0.288628	16 9
22	3 5 28.66	44.36	16 19 31.8	3 36.5	0.289052	16 10
23	3 4 44.30	43.78	16 15 55.3	3 34.1	0.289540	16 11
24	3 4 0.52	−43.13	16 12 21.2	−3 31.4	0.290090	16 12
25	3 3 17.39	42.42	+16 8 49.8	3 28.4	0.290702	16 13
26	3 2 34.97	41.68	16 5 21.4	3 25.3	0.291376	16 15
27	3 1 53.29	40.90	16 1 56.1	3 22.0	0.292109	16 16
28	3 1 12.39	40.07	15 58 34.1	3 18.3	0.292901	16 18
29	3 0 32.32	−39.18	15 55 15.8	−3 14.4	0.293752	16 20
30	2 59 53.14	38.24	+15 52 1.4	3 10.3	0.294660	16 22
Dec. 1	2 59 14.90		15 48 51.1		0.295625	16 24

Opp. in AR. Nov. 13 Gröſse = 11.2

P. Neugebauer.

(170) MARIA 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	′ ″		m s
Oct. 30	3 49 59.93	−55.22	+41 56 7.8	−0 6.6	0.188968	12 50
31	3 49 4.71	56.79	41 56 1.2	0 24.2	0.187354	12 47
Nov. 1	3 48 7.92	58.30	41 55 37.0	0 42.1	0.185796	12 45
2	3 47 9.62	59.71	41 54 54.9	1 0.2	0.184295	12 42
3	3 46 9.91	−61.06	41 53 54.7	−1 18.5	0.182852	12 39
4	3 45 8.85	62.33	+41 52 36.2	1 36.9	0.181468	12 37
5	3 44 6.52	63.51	41 50 59.3	1 55.5	0.180145	12 35
6	3 43 3.01	64.60	41 49 3.8	2 14.2	0.178884	12 33
7	3 41 58.41	65.60	41 46 49.6	2 33.1	0.177687	12 31
8	3 40 52.81	−66.52	41 44 16.5	−2 52.1	0.176555	12 29
9	3 39 46.29	67.34	+41 41 24.4	3 11.1	0.175489	12 27
10	3 38 38.95	68.04	41 38 13.3	3 30.2	0.174491	12 25
11	3 37 30.91	68.66	41 34 43.1	3 49.2	0.173561	12 23
12	3 36 22.25	69.17	41 30 53.9	4 8.3	0.172700	12 22
13	3 35 13.08	−69.56	41 26 45.6	−4 27.3	0.171910	12 21
14	3 34 3.52	69.86	+41 22 18.3	4 46.1	0.171193	12 19
15	3 32 53.66	70.04	41 17 32.2	5 4.9	0.170549	12 18
16	3 31 43.62	70.11	41 12 27.3	5 23.3	0.169978	12 17
☍ 17	3 30 33.51	70.06	41 7 4.0	5 41.5	0.169481	12 16
18	3 29 23.45	−69.90	41 1 22.5	−5 59.5	0.169060	12 16
19	3 28 13.55	69.64	+40 55 23.0	6 17.0	0.168715	12 15
20	3 27 3.91	69.24	40 49 6.0	6 34.3	0.168446	12 15
21	3 25 54.67	68.74	40 42 31.7	6 51.1	0.168253	12 14
22	3 24 45.93	68.13	40 35 40.6	7 7.5	0.168138	12 14
23	3 23 37.80	−67.41	40 28 33.1	−7 23.4	0.168100	12 14
24	3 22 30.39	66.59	+40 21 9.7	7 38.7	0.168138	12 14
25	3 21 23.80	65.65	40 13 31.0	7 53.5	0.168254	12 14
26	3 20 18.15	64.64	40 5 37.5	8 7.7	0.168448	12 15
27	3 19 13.51	63.51	39 57 29.8	8 21.3	0.168718	12 15
28	3 18 10.00	−62.30	39 49 8.5	−8 34.2	0.169063	12 16
29	3 17 7.70	61.00	+39 40 34.3	8 46.5	0.169483	12 16
30	3 16 6.70	59.61	39 31 47.8	8 58.1	0.169980	12 17
Dec. 1	3 15 7.09	58.15	39 22 49.7	9 8.9	0.170551	12 18
2	3 14 8.94	56.63	39 13 40.8	9 19.1	0.171195	12 19
3	3 13 12.31	−55.03	39 4 21.7	−9 28.6	0.171912	12 21
4	3 12 17.28	53.37	+38 54 53.1	9 37.4	0.172701	12 23
5	3 11 23.91		38 45 15.7		0.173561	12 24

Opp. in AR. Nov. 17 Gröfse = 11.5

P. Neugebauer.

(121) HERMIONE 1900.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	″		m s
Nov. 16	4 54 33.01	−45.10	+21 3 59.5	+33.3	0.360527	19 3
17	4 53 47.91	45.88	21 4 32.8	32.4	0.359858	19 1
18	4 53 2.03	46.62	21 5 5.2	31.4	0.359241	18 59
19	4 52 15.41	47.31	21 5 36.6	30.4	0.358677	18 58
20	4 51 28.10	−47.94	21 6 7.0	+29.4	0.358167	18 57
21	4 50 40.16	48.52	+21 6 36.4	28.5	0.357711	18 56
22	4 49 51.64	49.06	21 7 4.9	27.5	0.357311	18 54
23	4 49 2.58	49.55	21 7 32.4	26.6	0.356966	18 53
24	4 48 13.03	49.98	21 7 59.0	25.7	0.356677	18 53
25	4 47 23.05	−50.34	21 8 24.7	+24.7	0.356445	18 52
26	4 46 32.71	50.66	+21 8 49.4	23.8	0.356270	18 52
27	4 45 42.05	50.94	21 9 13.2	23.0	0.356152	18 51
28	4 44 51.11	51.15	21 9 36.2	22.2	0.356092	18 51
29	4 43 59.96	51.31	21 9 58.4	21.4	0.356090	18 51
30	4 43 8.65	−51.41	21 10 19.8	+20.8	0.356146	18 51
Dec. 1	4 42 17.24	51.46	+21 10 40.6	20.1	0.356260	18 52
2	4 41 25.78	51.46	21 11 0.7	19.6	0.356432	18 52
☍ 3	4 40 34.32	51.41	21 11 20.3	19.1	0.356662	18 53
4	4 39 42.91	51.30	21 11 39.4	18.6	0.356949	18 53
5	4 38 51.61	−51.15	21 11 58.0	+18.1	0.357294	18 54
6	4 38 0.46	50.94	+21 12 16.1	17.7	0.357696	18 55
7	4 37 9.52	50.69	21 12 33.8	17.5	0.358155	18 57
8	4 36 18.83	50.37	21 12 51.3	17.3	0.358671	18 58
9	4 35 28.46	50.01	21 13 8.6	17.1	0.359244	19 0
10	4 34 38.45	−49.61	21 13 25.7	+17.1	0.359873	19 1
11	4 33 48.84	49.15	+21 13 42.8	17.1	0.360558	19 3
12	4 32 59.69	48.64	21 13 59.9	17.2	0.361299	19 5
13	4 32 11.05	48.07	21 14 17.1	17.4	0.362095	19 7
14	4 31 22.98	47.48	21 14 34.5	17.7	0.362945	19 9
15	4 30 35.50	−46.82	21 14 52.2	+18.1	0.363849	19 11
16	4 29 48.68	46.12	+21 15 10.3	18.5	0.364805	19 14
17	4 29 2.56	45.38	21 15 28.8	19.0	0.365814	19 17
18	4 28 17.18	44.60	21 15 47.8	19.6	0.366875	19 19
19	4 27 32.58	43.76	21 16 7.4	20.4	0.367986	19 22
20	4 26 48.82	−42.88	21 16 27.8	+21.2	0.369147	19 26
21	4 26 5.94	41.96	+21 16 49.0	22.0	0.370357	19 30
22	4 25 23.98		21 17 11.0		0.371616	19 33

Opp. in AR. Dec. 3   Gröfse = 11.0

V. Neugebauer.

(56) MELETE 1900—1901.

12h Mittl. Zeit		AR. h m s	Diff. s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Aberr.-Zt. m s
1900 Dec.	1	7 8 52.67	−35.70	+11 35 17.8	−1 36.8	0.366303	19 19
	2	7 8 16.97	36.95	11 33 41.0	1 31.9	0.364839	19 15
	3	7 7 40.02	38.18	11 32 9.1	1 27.0	0.363413	19 11
	4	7 7 1.84	39.39	11 30 42.1	1 22.1	0.362025	19 7
	5	7 6 22.45	−40.57	11 29 20.0	−1 16.9	0.360678	19 4
	6	7 5 41.88	41.72	+11 28 3.1	1 11.9	0.359372	19 0
	7	7 5 0.16	42.85	11 26 51.2	1 6.7	0.358108	18 57
	8	7 4 17.31	43.94	11 25 44.5	1 1.6	0.356888	18 54
	9	7 3 33.37	45.00	11 24 42.9	0 56.3	0.355712	18 51
	10	7 2 48.37	−46.04	11 23 46.6	−0 51.0	0.354582	18 48
	11	7 2 2.33	47.04	+11 22 55.6	0 45.7	0.353499	18 45
	12	7 1 15.29	47.99	11 22 9.9	0 40.3	0.352464	18 42
	13	7 0 27.30	48.91	11 21 29.6	0 35.0	0.351479	18 40
	14	6 59 38.39	49.79	11 20 54.6	0 29.7	0.350544	18 37
	15	6 58 48.60	−50.63	11 20 24.9	−0 24.2	0.349661	18 35
	16	6 57 57.97	51.42	+11 20 0.7	0 18.8	0.348830	18 33
	17	6 57 6.55	52.17	11 19 41.9	0 13.4	0.348052	18 31
	18	6 56 14.38	52.86	11 19 28.5	0 8.0	0.347329	18 29
	19	6 55 21.52	53.51	11 19 20.5	−0 2.6	0.346661	18 28
	20	6 54 28.01	−54.10	11 19 17.9	+0 2.8	0.346049	18 26
	21	6 53 33.91	54.65	+11 19 20.7	0 8.1	0.345494	18 25
	22	6 52 39.26	55.14	11 19 28.8	0 13.5	0.344996	18 23
	23	6 51 44.12	55.58	11 19 42.3	0 18.8	0.344557	18 22
	24	6 50 48.54	55.95	11 20 1.1	0 24.1	0.344176	18 21
	25	6 49 52.59	−56.28	11 20 25.2	+0 29.3	0.343854	18 21
	26	6 48 56.31	56.54	+11 20 54.5	0 34.4	0.343592	18 20
	27	6 47 59.77	56.75	11 21 28.9	0 39.6	0.343390	18 19
	28	6 47 3.02	56.91	11 22 8.5	0 44.7	0.343247	18 19
	29	6 46 6.11	57.00	11 22 53.2	0 49.6	0.343165	18 19
	30	6 45 9.11	−57.05	11 23 42.8	+0 54.6	0.343143	18 19
	☍ 31	6 44 12.06	57.04	+11 24 37.4	0 59.5	0.343182	18 19
1901 Jan.	1	6 43 15.02	56.97	11 25 36.9	1 4.3	0.343281	18 19
	2	6 42 18.05	56.85	11 26 41.2	1 9.1	0.343440	18 19
	3	6 41 21.20	56.69	11 27 50.3	1 13.7	0.343660	18 20
	4	6 40 24.51	−56.46	11 29 4.0	+1 18.4	0.343939	18 21
	5	6 39 28.05	56.18	+11 30 22.4	1 22.9	0.344278	18 22
	6	6 38 31.87		11 31 45.3		0.344676	18 23

Opp. in AR. 1900 Dec. 31 Gröſse = 12.4

R. Luther.

(153) HILDA 1900—1901.

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	s	° ′ ″	″		m s
1900 Dec. 13	6 53 32.89	−35.48	+15 16 27.7	−29.6	0.567147	30 40
14	6 52 57.41	35.96	15 15 58.1	27.4	0.566508	30 37
15	6 52 21.45	36.44	15 15 30.7	25.2	0.565904	30 34
16	6 51 45.01	36.88	15 15 5.5	23.0	0.565334	30 32
17	6 51 8.13	−37.30	15 14 42.5	−20.9	0.564798	30 30
18	6 50 30.83	37.70	+15 14 21.6	18.7	0.564297	30 28
19	6 49 53.13	38.05	15 14 2.9	16.5	0.563831	30 26
20	6 49 15.08	38.38	15 13 46.4	14.4	0.563402	30 24
21	6 48 36.70	38.68	15 13 32.0	12.4	0.563009	30 22
22	6 47 58.02	−38.96	15 13 19.6	−10.2	0.562653	30 21
23	6 47 19.06	39.20	+15 13 9.4	8.1	0.562333	30 19
24	6 46 39.86	39.40	15 13 1.3	6.0	0.562051	30 18
25	6 46 0.46	39.58	15 12 55.3	3.9	0.561806	30 17
26	6 45 20.88	39.73	15 12 51.4	− 2.0	0.561598	30 16
27	6 44 41.15	−39.84	15 12 49.4	0.0	0.561428	30 15
28	6 44 1.31	39.91	+15 12 49.4	+ 1.9	0.561296	30 15
29	6 43 21.40	39.97	15 12 51.3	3.9	0.561202	30 14
30	6 42 41.43	39.99	15 12 55.2	5.8	0.561145	30 14
☍ 31	6 42 1.44	39.98	15 13 1.0	7.7	0.561126	30 14
1901 Jan. 1	6 41 21.46	−39.94	15 13 8.7	+ 9.6	0.561144	30 14
2	6 40 41.52	39.88	+15 13 18.3	11.4	0.561201	30 14
3	6 40 1.64	39.78	15 13 29.7	13.2	0.561295	30 15
4	6 39 21.86	39.64	15 13 42.9	15.1	0.561428	30 15
5	6 38 42.22	39.49	15 13 58.0	16.8	0.561598	30 16
6	6 38 2.73	−39.31	15 14 14.8	+18.6	0.561806	30 17
7	6 37 23.42	39.09	+15 14 33.4	20.3	0.562050	30 18
8	6 36 44.33	38.84	15 14 53.7	22.0	0.562331	30 19
9	6 36 5.49	38.58	15 15 15.7	23.8	0.562649	30 20
10	6 35 26.91	38.28	15 15 39.5	25.4	0.563004	30 22
11	6 34 48.63	−37.94	15 16 4.9	+27.0	0.563396	30 24
12	6 34 10.69	37.58	+15 16 31.9	28.6	0.563823	30 25
13	6 33 33.11	37.20	15 17 0.5	30.1	0.564286	30 27
14	6 32 55.91	36.78	15 17 30.6	31.6	0.564785	30 29
15	6 32 19.13	36.34	15 18 2.2	33.2	0.565319	30 32
16	6 31 42.79	−35.87	15 18 35.4	+34.7	0.565889	30 35
17	6 31 6.92	35.37	+15 19 10.1	36.2	0.566493	30 37
18	6 30 31.55		15 19 46.3		0.567130	30 40

Opp. in AR. 1900 Dec. 31 Gröſse = 13.4

P. Neugebauer.

(433) EROS 1900 — 1901.

12ʰ Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	m s	° ′ ″	′ ″		m s
1900 Sept. 1	2 21 34.29	+1 10.29	+33 38 45.6	+21 58.9	9.908790	6 44
2	2 22 44.58	1 9.13	34 0 44.5	22 3.4	9.903911	6 39
3	2 23 53.71	1 7.92	34 22 47.9	22 7.6	9.899011	6 35
4	2 25 1.63	1 6.65	34 44 55.5	22 11.9	9.894091	6 30
5	2 26 8.28	+1 5.26	35 7 7.4	+22 16.2	9.889151	6 26
6	2 27 13.54	1 3.83	+35 29 23.6	22 19.7	9.884191	6 22
7	2 28 17.37	1 2.36	35 51 43.3	22 23.3	9.879213	6 18
8	2 29 19.73	1 0.81	36 14 6.6	22 26.6	9.874216	6 13
9	2 30 20.54	0 59.22	36 36 33.2	22 29.9	9.869202	6 9
10	2 31 19.76	+0 57.55	36 59 3.1	+22 33.5	9.864173	6 5
11	2 32 17.31	0 55.82	+37 21 36.6	22 36.7	9.859126	6 1
12	2 33 13.13	0 54.02	37 44 13.3	22 40.0	9.854061	5 56
13	2 34 7.15	0 52.17	38 6 53.3	22 42.8	9.848981	5 52
14	2 34 59.32	0 50.22	38 29 36.1	22 45.4	9.843884	5 48
15	2 35 49.54	+0 48.21	38 52 21.5	+22 47.6	9.838774	5 44
16	2 36 37.75	0 46.09	+39 15 9.1	22 49.5	9.833649	5 40
17	2 37 23.84	0 43.90	39 37 58.6	22 50.9	9.828513	5 36
18	2 38 7.74	0 41.62	40 0 49.5	22 52.3	9.823365	5 32
19	2 38 49.36	0 39.29	40 23 41.8	22 53.2	9.818207	5 28
20	2 39 28.65	+0 36.84	40 46 35.0	+22 53.7	9.813039	5 24
21	2 40 5.49	0 34.36	+41 9 28.7	22 53.7	9.807864	5 20
22	2 40 39.85	0 31.75	41 32 22.4	22 53.0	9.802680	5 16
23	2 41 11.60	0 29.07	41 55 15.4	22 51.4	9.797493	5 13
24	2 41 40.67	0 26.30	42 18 6.8	22 49.5	9.792301	5 9
25	2 42 6.97	+0 23.44	42 40 56.3	+22 47.1	9.787108	5 5
26	2 42 30.41	0 20.49	+43 3 43.4	22 44.1	9.781912	5 2
27	2 42 50.90	0 17.48	43 26 27.5	22 40.5	9.776718	4 58
28	2 43 8.38	0 14.37	43 49 8.0	22 36.4	9.771524	4 54
29	2 43 22.75	0 11.22	44 11 44.4	22 31.3	9.766334	4 51
30	2 43 33.97	+0 7.95	44 34 15.7	+22 25.5	9.761147	4 48
Oct. 1	2 43 41.92	0 4.59	+44 56 41.2	22 18.8	9.755966	4 44
2	2 43 46.51	+0 1.16	45 19 0.0	22 11.7	9.750792	4 41
3	2 43 47.67	−0 2.35	45 41 11.7	22 3.4	9.745625	4 38
4	2 43 45.32	0 5.97	46 3 15.1	21 53.8	9.740468	4 34
5	2 43 39.35	−0 9.70	46 25 8.9	+21 43.4	9.735323	4 31
6	2 43 29.65	0 13.53	+46 46 52.3	21 30.9	9.730190	4 28
7	2 43 16.12	0 17.46	47 8 23.2	21 17.6	9.725072	4 25
8	2 42 58.66	0 21.49	47 29 40.8	21 4.3	9.719970	4 22
9	2 42 37.17	0 25.58	47 50 45.1	20 50.6	9.714886	4 19
10	2 42 11.59		48 11 35.7		9.709819	4 16

Grölse Sept. 1: 11.1 Sept. 14: 10.7 Sept. 27: 10.3

(433) EROS 1900 — 1901. (Fortsetzung.)

12h Mittl. Zeit	AR. h m s	Diff. m s	Decl. ° ' "	Diff. ' "	Log. Δ	Aberr.-Zt. m s
1900 Oct. 9	2 42 37.17	−0 25.58	+47 50 45.1	+20 50.6	9.714886	4 19
10	2 42 11.59	0 29.76	48 11 35.7	20 34.0	9.709819	4 16
11	2 41 41.83	0 33.99	48 32 9.7	20 15.7	9.704772	4 13
12	2 41 7.84	0 38.35	48 52 25.4	19 56.3	9.699747	4 10
13	2 40 29.49	−0 42.76	49 12 21.7	+19 35.2	9.694746	4 7
14	2 39 46.73	0 47.23	+49 31 56.9	19 11.9	9.689773	4 4
15	2 38 59.50	0 51.80	49 51 8.8	18 46.7	9.684827	4 1
16	2 38 7.70	0 56.36	50 9 55.5	18 21.1	9.679913	3 58
17	2 37 11.34	1 0.93	50 28 16.6	17 53.2	9.675033	3 56
18	2 36 10.41	−1 5.50	50 46 9.8	+17 23.0	9.670188	3 53
19	2 35 4.91	1 10.04	+51 3 32.8	16 51.1	9.665381	3 51
20	2 33 54.87	1 14.55	51 20 23.9	16 16.7	9.660613	3 48
21	2 32 40.32	1 18.97	51 36 40.6	15 40.5	9.655887	3 45
22	2 31 21.35	1 23.32	51 52 21.1	15 3.3	9.651207	3 43
23	2 29 58.03	−1 27.54	52 7 24.4	+14 23.2	9.646574	3 41
24	2 28 30.49	1 31.67	+52 21 47.6	13 40.7	9.641989	3 38
25	2 26 58.82	1 35.64	52 35 28.3	12 57.6	9.637455	3 36
26	2 25 23.18	1 39.45	52 48 25.9	12 12.1	9.632977	3 34
27	2 23 43.73	1 43.07	53 0 38.0	11 24.9	9.628556	3 32
28	2 22 0.66	−1 46.45	53 12 2.9	+10 36.1	9.624193	3 30
29	2 20 14.21	1 49.55	+53 22 39.0	9 45.9	9.619889	3 28
☍ 30	2 18 24.66	1 52.41	53 32 24.9	8 53.4	9.615646	3 26
31	2 16 32.25	1 54.93	53 41 18.3	7 59.3	9.611464	3 24
Nov. 1	2 14 37.32	1 57.21	53 49 17.6	7 5.4	9.607346	3 22
2	2 12 40.11	−1 59.15	53 56 23.0	+ 6 10.2	9.603292	3 20
3	2 10 40.96	2 0.79	+54 2 33.2	5 13.1	9.599306	3 18
4	2 8 40.17	2 2.09	54 7 46.3	4 15.1	9.595387	3 16
5	2 6 38.08	2 3.05	54 12 1.4	3 15.5	9.591537	3 14
6	2 4 35.03	2 3.62	54 15 16.9	2 15.6	9.587758	3 13
7	2 2 31.41	−2 3.82	54 17 32.5	+ 1 14.2	9.584052	3 11
8	2 0 27.59	2 3.61	+54 18 46.7	+ 0 12.8	9.580419	3 10
9	1 58 23.98	2 3.11	54 18 59.5	− 0 49.2	9.576860	3 8
10	1 56 20.87	2 1.97	54 18 10.3	1 51.2	9.573378	3 7
11	1 54 18.90	2 0.65	54 16 19.1	2 53.4	9.569974	3 5
12	1 52 18.25	−1 58.88	54 13 25.7	− 3 55.2	9.566649	3 4
13	1 50 19.37	1 56.60	+54 9 30.5	4 57.6	9.563403	3 2
14	1 48 22.77	1 53.95	54 4 32.9	5 59.3	9.560237	3 1
15	1 46 28.82	1 50.82	53 58 33.6	6 59.9	9.557154	3 0
16	1 44 38.00	1 47.30	53 51 33.7	7 59.5	9.554155	2 59
17	1 42 50.70		53 43 34.2		9.551238	2 57

Größe Oct. 10: 9.9 Oct. 23: 9.5 Nov. 5: 9.2

(433) EROS 1900—1901. (Fortsetzung.)

12h Mittl. Zeit	AR.	Diff.	Decl.	Diff.	Log. Δ	Aberr.-Zt.
	h m s	m s	° ′ ″	′ ″		m s
1900 Nov. 16	1 44 38.00	−1 47.30	+53 51 33.7	− 7 59.5	9.554155	2 59
17	1 42 50.70	1 43.36	53 43 34.2	8 59.0	9.551238	2 57
18	1 41 7.34	1 39.13	53 34 35.2	9 56.8	9.548405	2 56
19	1 39 28.21	1 34.52	53 24 38.4	10 54.0	9.545659	2 55
20	1 37 53.69	−1 29.63	53 13 44.4	−11 49.2	9.542998	2 54
21	1 36 24.06	1 24.42	+53 1 55.2	12 42.9	9.540421	2 53
22	1 34 59.64	1 18.89	52 49 12.3	13 34.6	9.537930	2 52
23	1 33 40.75	1 13.11	52 35 37.7	14 24.3	9.535525	2 51
24	1 32 27.64	1 7.06	52 21 13.4	15 11.6	9.533206	2 50
25	1 31 20.58	−1 0.87	52 6 1.8	−15 57.5	9.530971	2 49
26	1 30 19.71	0 54.50	+51 50 4.3	16 40.9	9.528819	2 49
27	1 29 25.21	0 48.02	51 33 23.4	17 22.3	9.526750	2 48
28	1 28 37.19	0 41.42	51 16 1.1	18 1.7	9.524763	2 47
29	1 27 55.77	0 34.75	50 57 59.4	18 38.8	9.522857	2 46
30	1 27 21.02	−0 28.06	50 39 20.6	−19 13.8	9.521030	2 46
Dec. 1	1 26 52.96	0 21.30	+50 20 6.8	19 47.3	9.519281	2 45
2	1 26 31.66	0 14.55	50 0 19.5	20 18.9	9.517609	2 44
3	1 26 17.11	0 7.81	49 40 0.6	20 48.3	9.516014	2 44
4	1 26 9.30	−0 1.06	49 19 12.3	21 16.2	9.514494	2 43
5	1 26 8.24	+0 5.63	48 57 56.1	−21 42.2	9.513049	2 43
6	1 26 13.87	0 12.27	+48 36 13.9	22 6.7	9.511678	2 42
7	1 26 26.14	0 18.88	48 14 7.2	22 29.7	9.510379	2 42
8	1 26 45.02	0 25.38	47 51 37.5	22 51.5	9.509155	2 41
9	1 27 10.40	0 31.87	47 28 46.0	23 11.8	9.508004	2 41
10	1 27 42.27	+0 38.23	47 5 34.2	−23 30.5	9.506926	2 40
11	1 28 20.50	0 44.54	+46 42 3.7	23 47.1	9.505920	2 40
12	1 29 5.04	0 50.77	46 18 16.6	24 2.7	9.504984	2 39
13	1 29 55.81	0 56.92	45 54 13.9	24 16.7	9.504118	2 39
14	1 30 52.73	1 2.98	45 29 57.2	24 29.5	9.503321	2 39
15	1 31 55.71	+1 9.01	45 5 27.7	−24 41.5	9.502591	2 38
16	1 33 4.72	1 14.89	+44 40 46.2	24 51.9	9.501930	2 38
17	1 34 19.61	1 20.72	44 15 54.3	25 1.8	9.501337	2 38
18	1 35 40.33	1 26.45	43 50 52.5	25 10.3	9.500810	2 38
19	1 37 6.78	1 32.07	43 25 42.2	25 16.6	9.500350	2 38
20	1 38 38.85	+1 37.54	43 0 25.6	−25 23.5	9.499955	2 38
21	1 40 16.39	1 42.91	+42 35 2.1	25 28.8	9.499624	2 38
22	1 41 59.30	1 48.15	42 9 33.3	25 33.3	9.499355	2 37
23	1 43 47.45	1 53.24	41 44 0.0	25 36.8	9.499149	2 37
24	1 45 40.69	1 58.21	41 18 23.2	25 39.4	9.499003	2 37
25	1 47 38.90		40 52 43.8		9.498918	2 37

Gröſse Nov. 18: 8.9 Dec. 1: 8.7 Dec. 14: 8.5

(433) EROS 1900 — 1901. (Fortsetzung.)

12ʰ Mittl. Zeit	AR. h m s	Diff. m s	Decl. ° ′ ″	Diff. ′ ″	Log. Δ	Aberr.-Zt. m s
1900 Dec. 24	1 45 40.69	+1 58.21	+41 18 23.2	−25 39.4	9.499003	2 37
25	1 47 38.90	2 3.07	40 52 43.8	25 41.7	9.498918	2 37
26	1 49 41.97	2 7.77	40 27 2.1	25 43.7	9.498891	2 37
27	1 51 49.74	2 12.35	40 1 18.4	25 44.1	9.498923	2 37
28	1 54 2.09	+2 16.80	39 35 34.3	−25 44.2	9.499012	2 37
29	1 56 18.89	2 21.14	+39 9 50.1	25 44.4	9.499156	2 37
30	1 58 40.03	2 25.42	38 44 5.7	25 44.5	9.499356	2 38
31	2 1 5.45	2 29.43	38 18 21.2	25 43.9	9.499612	2 38
1901 Jan. 1	2 3 34.88	2 33.33	37 52 37.3	25 43.1	9.499923	2 38
2	2 6 8.21	+2 37.06	37 26 54.2	−25 42.6	9.500288	2 38
3	2 8 45.27	2 40.56	+37 1 11.6	25 41.8	9.500708	2 38
4	2 11 25.83	2 43.98	36 35 29.8	25 40.3	9.501183	2 38
5	2 14 9.81	2 47.35	36 9 49.5	25 40.2	9.501713	2 38
6	2 16 57.16	2 50.58	35 44 9.3	25 39.2	9.502298	2 38
7	2 19 47.74	+2 53.74	35 18 30.1	−25 38.0	9.502940	2 39
8	2 22 41.48	2 56.77	+34 52 52.1	25 36.6	9.503638	2 39
9	2 25 38.25	2 59.71	34 27 15.5	25 34.6	9.504392	2 39
10	2 28 37.96	3 2.54	34 1 40.9	25 32.5	9.505204	2 40
11	2 31 40.50	3 5.25	33 36 8.4	25 30.6	9.506072	2 40
12	2 34 45.75	+3 7.88	33 10 37.8	−25 27.6	9.506997	2 40
13	2 37 53.63	3 10.41	+32 45 10.2	25 26.0	9.507980	2 41
14	2 41 4.04	3 12.83	32 19 44.2	25 23.6	9.509020	2 41
15	2 44 16.87	3 15.15	31 54 20.6	25 20.9	9.510119	2 41
16	2 47 32.02	3 17.41	31 28 59.7	25 18.0	9.511274	2 42
17	2 50 49.43	+3 19.56	31 3 41.7	−25 14.7	9.512487	2 42
18	2 54 8.99	3 21.65	+30 38 27.0	25 11.5	9.513758	2 43
19	2 57 30.64	3 23.62	30 13 15.5	25 8.0	9.515086	2 43
20	3 0 54.26	3 25.55	29 48 7.5	25 4.5	9.516471	2 44
21	3 4 19.81	3 27.37	29 23 3.0	25 0.6	9.517912	2 44
22	3 7 47.18	+3 29.05	28 58 2.4	−24 55.5	9.519408	2 45
23	3 11 16.23	3 30.61	+28 33 6.9	24 52.0	9.520958	2 45
24	3 14 46.84	3 32.08	28 8 14.9	24 47.7	9.522562	2 46
25	3 18 18.92	3 33.45	27 43 27.2	24 43.0	9.524220	2 47
26	3 21 52.37	3 34.76	27 18 44.2	24 38.5	9.525932	2 47
27	3 25 27.13	+3 36.00	26 54 5.7	−24 33.7	9.527698	2 48
28	3 29 3.13	3 37.13	+26 29 32.0	24 28.8	9.529516	2 49
29	3 32 40.26	3 38.18	26 5 3.2	24 23.9	9.531387	2 49
30	3 36 18.44	3 39.10	25 40 39.3	24 18.7	9.533312	2 50
31	3 39 57.54		25 16 20.6		9.535289	2 51

Gröſse Dec. 27: 8.4 Jan. 9: 8.4 Jan. 22: 8.5

Opp. in AR. 1900 Oct. 30

E. Millosevich.

ÜBER DIE PLANETEN (1)–(444).

Zur genaueren Bezeichnung derjenigen Stellen, an welchen die betreffenden Mittheilungen über die kleinen Planeten sich befinden, sind bei sämmtlichen hier benutzten Zeitschriften, nämlich bei den Astronomischen Nachrichten (A. N.), dem Astronomical Journal (A. J.), dem Bulletin Astronomique (B. A.), den Comptes Rendus (C. R.), den Monthly Notices (M. N.) die Band- und Seitenzahlen angegeben.

A. Beobachtungen.

Nr. und Name	Beobachtungsort	Datum der Beobachtung		Publication
1 Ceres	Arcetri (Mer.)	1899	April 29, Mai 1, 5, 7, 18_2, Mai 19_2	A. N. 150, 333
	Arcetri	»	April 28_2, 29, Mai 1, 2, 3_2, Mai 5	» » 150, 333
	Wien	1896	Oct. 4_2, 6_2, 9	» » 150, 17
2 Pallas	Arcetri (Mer.)	1899	April 29, Mai 1, 5, 7	» » 150, 333
	Arcetri	»	April 28, 29, Mai 1, 2, 6, Mai 7_2	» » 150, 333
	Wien	1892	Aug. 13, 14, 16	» » 150, 17
3 Juno	Berlin (Urania)	1898	April 10*	» » 148, 142
4 Vesta	Arcetri	»	Juli 20, 21, 23	» » 149, 257
	Windsor	»	April 19, 21, 24_2, 27_2, 28_2, April 29_2	» » 147, 313
5 Astraea	Toulouse	1896	Jan. 22_2, Febr. 7	B. A. 16, 172
6 Hebe	Bethlehem	1897	Nov. 27, 28, Dec. 8	A. J. 20, 37
	Jena	»	Dec. 16, 17	A. N. 148, 65
	Toulouse	»	Dec. 27, 29	B. A. 16, 325
	Toulouse	1896	Mai 15, 19, Juni 1_2, 3_2, 5_2, Juni 6_3, 11_2, 12_2	» » 16, 173
	Vassar Coll.	1899	April 3, 4, 5	A. J. 20, 47
	Wien	1896	Juni 2_2, 8, 9	A. N. 150, 17
7 Iris	Algier	1898	Mai 4_2, 5_2, 6_2, 28_2, 31_2, Juni 2	» » 148, 211, B. A. 16, 64
	Arcetri	»	Mai 9_2, 10_2, 13, 14, 16, 25, Mai 31_2, Juni 2_2, 4_2, 6_2	A. N. 149, 257
	Düsseldorf	»	Mai 21, 22, 26, 28	» » 148, 377
	Marseille	»	Mai 9	B. A. 15, 422
	Padua	»	Mai 31, Juni 6_2, 12_2	A. N. 149, 355
	Washington	»	Mai 17, 18, 31, Juni 6, 9	A. J. 20, 13

Nr. und Name	Beobachtungsort	Datum der Beobachtung	Publication
7 Iris	Windsor	1898 Mai 8, 11, 12, 13, 14, 16, 17, Mai 19, 20, 21, 22, 24, 25, Juni 2, 4, 5	A. N. 147, 315
8 Flora	Berlin (Urania)	1894 Jan. 24*, 28*	» » 148, 139
	Düsseldorf	1898 April 26	» » 148, 377
	Pola	» April 30, Mai 1	» » 148, 219
	Toulouse	1896 Dec. 1, 3, 7_2, 8, 16_2	B. A. 16, 173
9 Metis	Marseille	1899 Febr. 20, 21, 22, März 1, 6	» » 16, 279
	Toulouse	1896 Mai 5, 6	» » 16, 173
11 Parthenope	Hamburg	1897 Oct. 15, 17	A. N. 149, 147
	Jena	» Oct. 14, 15	» » 148, 65
	Jena	1899 Febr. 3, 4	» » 149, 311
	Marseille	» Febr. 3, 4, 7, 9, 10, 11, 15, Febr. 16, 20, 21, 22, März 1, 6	B. A. 16, 278
	Marseille	» Jan. 17, 18	» » 16, 311
	Toulouse	1896 April 17_2, 28, Mai 2_2, 5_2, Mai 6, 13, 15, 19	» » 16, 173
	Vassar Coll.	1899 Jan. 30, Febr. 1, 9, 10	A. J. 20, 47
13 Egeria	Düsseldorf	1898 Mai 26, 28	A. N. 148, 377
16 Psyche	Heidelberg	1899 Juli 17*	» » 150, 109
	Toulouse	1897 Febr. 24_4	B. A. 16, 325
	Vassar Coll.	1898 Mai 9, 13, 14	A. J. 19, 187
17 Thetis	Genf	1899 Mai 2_2, 4_2	A. N. 150, 187
	Jena	1897 Dec. 29, 31	» » 148, 65
	Mt. Hamilton (Mer.)	1899 Mai 27, Juni 2	» » 150, 239
	Padua	1898 Jan. 19, 20, 21, 24	» » 149, 353
	Vassar Coll.	1899 April 27, Mai 2, 4	A. J. 20, 76
	Wien	1892 Sept. 15, 16, 17	A. N. 150, 17
18 Melpomene	Toulouse	1896 Febr. 14, 19, 24	B. A. 16, 174
19 Fortuna	Arcetri	1898 Oct. 22_2	A. N. 149, 263
	Bethlehem	» Oct. 6, 8, 9, 19, 20, 22	A. J. 20, 37
	Marseille	» Sept. 20_2, 21, 22, 23, Oct. 4, Oct. 6, 7	B. A. 16, 141
	Mt. Hamilton	» Sept. 9, 11, 19_2, 20, 28, Oct. 3, 12	A. J. 19, 194
	Padua	» Sept. 19, 20, Oct. 5_3, 20_2, Oct. 22_2, 23_2	A. N. 149, 359
	Toulouse	1897 Mai 18_2, 19	B. A. 16, 325
	Washington	1898 Oct. 12	A. J. 20, 13
20 Massalia	Toulouse	1896 Juni 11_4, 12_3, Juli 1, 3, 4_4, Juli 8_2, 13_2	B. A. 16, 174
21 Lutetia	Toulouse	1897 Juni 21, 22, 23_2, 25	» » 16, 325
24 Themis	Arcetri	1898 Mai 10, 13, 14, 15, 16, 18	A. N. 149, 259
	Düsseldorf	» April 20, Mai 21, 22	» » 148, 377

Nr. und Name	Beobachtungsort	Datum der Beobachtung	Publication
24 Themis . .	Marseille . .	1898 Mai 10, 11	B. A. 15, 422
	Pola . . .	» April 30, Mai 1	A. N. 148, 219
	Washington .	» Mai 17, 18	A. J. 20, 13
	Wien . . .	1894 Aug. 6, 7, 24_2, 25, 26_2, 27_2	A. N. 150, 17
	Wien . . .	1895 Oct. 14_2, 15	» » 150, 17
25 Phocaea . .	Marseille . .	1898 Aug. 4, 5, 6, 9, 10, 11, 12,	
		Aug. 13	B. A. 16, 139
	Mt. Hamilton .	» Aug. 14, 15, 16 . . .	A. J. 20, 27
	München . .	» Juli 16, 18, 21_2, Aug. 2_3,	
		Aug. 5_2	A. N. 150, 225
	Padua . . .	» Juli 17, 18_3, 22_3, Aug. 6_2,	
		Aug. 7_2, 13	» » 149, 357
	Paris . . .	» Aug. 5, 10_2, 11_2, 12_2, 13_2	B. A. 16, 123
26 Proserpina .	Düsseldorf . .	» Nov. 7, 11, 17	A. N. 148, 377
	Jena . . .	1897 Aug. 5, 7	» » 148, 65
	Jena . . .	1898 Nov. 13	» » 149, 311
	München . .	» Oct. 27_2	» » 150, 227
	Padua . . .	» Oct. 26, Nov. 8_2, 12 . .	» » 149, 361
	Toulouse . .	1896 März 16, 17, 23 . . .	B. A. 16, 174
	Toulouse . .	1897 Juli 5, 6, 21_2, 22_3, 23_2 .	» » 16, 325
27 Euterpe . .	Heidelberg . .	1899 Juli 17*	A. N. 150, 109
	Toulouse . .	1896 Oct. 15, 26, 29_2 . . .	B. A. 16, 174
28 Bellona . .	Düsseldorf . .	1898 Sept. 15	A. N. 148, 377
	Hamburg . .	1897 Juli 12, 29, 30, Aug. 2, 3	» » 149, 147
	München . .	1898 Oct. 4	» » 150, 227
	Padua . . .	» Sept. 20, Oct. 5_2, 21_2, 22,	
		Oct. 23, 24	» » 149, 359
29 Amphitrite .	Padua . . .	1897 Dec. 23, 1898 Jan. 14, 19,	
		Jan. 20, 21, 22	» » 149, 353
	Pola . . .	1898 Jan. 12	» » 148, 219
	Wien . . .	1892 Aug. 16, 17_2, 18 . . .	» » 150, 19
32 Pomona			
= [1899 *EP*]	Berlin (Urania) .	1898 April 14*	» » 148, 142
	Besançon . .	1899 Aug. 29_2, 30_2, 31_2, Sept. 1_2,	
		Sept. 4, 5, 6, 13, 14, 15 .	» » 150, 327.
			C. R. 129, 446
	Paris . . .	» Aug. 26_2	A. J. 20, 104
			A. N. 150, 255
			C. R. 129, 435
	Pola . . .	1898 April 15	A. N. 148, 219
33 Polyhymnia .	Arcetri . . .	» Dec. 4_2, 5_2, 6_2, 10, 11, 12	» » 149, 263
	Padua . . .	» Dec. 16, 22	» » 149, 363
	Toulouse . .	1897 Mai 29_2	B. A. 16, 326
	Washington .	1898 Dec. 14	A. J. 20, 13

Nr. und Name	Beobachtungsort	Datum der Beobachtung	Publication
33 Polyhymnia .	Wien . . .	1893 Nov. 13. 14, 29_2 . . .	A. N. 150, 19
35 Leukothea .	Arcetri . . .	1898 Sept. 8. 9, 10, 11_2, 13 .	» » 149, 263
37 Fides . . .	Düsseldorf . .	» Sept. 16. 17, Oct. 5_2. 8 .	» » 148, 377
	München . .	» Sept. 26, 27_2	» » 150, 227
	Padua . . .	» Sept. 18. 21, Oct. 5_2, 20_3,	
		Oct. 21, 24_2	» » 149, 359
	Toulouse . .	1896 April 17, 21	B. A. 16, 174
38 Leda . . .	Wien . . .	1897 März 4_2, 5	A. N. 150, 19
40 Harmonia . .	Berlin (Urania) .	» April 9*	» » 148, 141
42 Isis . . .	Algier . . .	1898 Mai 31_2	» » 148, 211,
			B. A. 16, 65
	Arcetri . . .	» Juni 12, 13, 14, 18 . .	A. N. 149, 257
	Düsseldorf . .	» Mai 28, Juni 13. 14 . .	» » 148, 377
	Hamburg . .	» Mai 21	» » 149, 147
	Padua . . .	» Mai 24, 31, Juni 6_2, 11_2, 12,	
		Juni 20_2, 25	» » 149, 355
	Rom . . .	» Mai 23	» » 149, 305
	Windsor . .	» Mai 19, 20, 21, 22, 24, 26,	
		Juni 4_2, 5	» » 147, 315
43 Ariadne . .	Hamburg . .	1897 Sept. 27, Oct. 2	» » 149, 147
	Toulouse . .	» Oct. 14, 18, 20, 21, 23, 26_3,	
		Oct. 27	B. A. 16, 326
	Wien . . .	» Sept. 25_2, 27, 28, 29 . .	A. N. 150, 19
44 Nysa . . .	Berlin (Urania) .	1894 Jan. 24*, 28*	» » 148, 139
	Wien . . .	1892 Aug. 27_2	» » 150, 19
45 Eugenia . .	Berlin (Urania) .	1897 April 9*	» » 148, 141
46 Hestia . .	Arcetri . . .	1898 Dec. 10, 11_2, 12, 16_2, 17_2	» » 149, 263
	Jena . . .	1899 Jan. 6, 9	» » 149, 311
	Padua . . .	1898 Dec. 5, 16, 21, 22_2, 23_3 .	» » 149, 363
	Vassar Coll. .	» Dec. 14, 15, 16 . . .	A. J. 20, 47
47 Aglaja . .	Jena . . .	1897 Dec. 19	A. N. 148, 65
	Toulouse . .	1896 Sept. 3, 5, 7, 11 . . .	B. A. 16, 175
48 Doris . . .	Berlin (Urania) .	1898 Jan. 19*	A. N. 148, 142
49 Pales . . .	Wien . . .	1895 Aug. 21_2, 22_2, 23, 24_2, 26_2,	
		Aug. 27_2, 28_2, 29_2, 30_2, 31_2	» » 150, 19
51 Nemausa . .	Berlin (Urania) .	1894 Jan. 9*	» » 148, 139
52 Europa . .	Berlin (Urania) .	1897 Mai 3*, 6*	» » 148, 141
	Toulouse . .	1896 Febr. 5. 6, 7, 8_2, 10 . .	B. A. 16, 175
53 Kalypso . .	Arcetri . . .	1898 Aug. 12, 13, 14_2, 16, 17,	
		Aug. 18, Sept. 6_2, 7 . .	A. N. 149, 261
	Hamburg . .	» Aug. 21	» » 149, 147
	München . .	» Aug. 13_2, 16_2	» » 150, 227
	Toulouse . .	1896 März 5, 7_2	B. A. 16, 175
56 Melete . .	Düsseldorf . .	1898 März 21, April 8 . . .	A. N. 148, 377

Nr. und Name	Beobachtungsort	Datum der Beobachtung	Publication
56 Melete	Vassar Coll.	1898 April 8	A. J. 20, 29
	Wien	» März 27	A. N. 149. 289
57 Mnemosyne	Arcetri	» Aug. 22, 27, Sept. 6. 7, 8,	
		Sept. 9. 10	» » 149. 263
	Düsseldorf	» Aug. 20, 21, 22, 25	» » 148, 379
	Jena	1897 Juni 2	» » 148, 65
	Hamburg	1898 Aug. 21	» » 149, 147
	München	» Aug. 16_2, 27_3, Sept. 6_3	» » 150, 227
	Padua	» Sept. 16, 17_3, 18, 19_3, 20,	
		Sept. 21_3, 22	» » 149, 357
	Toulouse	1897 Juni 21_2, 22, 23_2	B. A. 16, 326
58 Concordia	Arcetri	1898 Dec. 5_2, 6_2, 7_2, 10, 11, 12	A. N. 149, 275
	Jena	» Dec. 5, 6	» » 149, 311
	Padua	» Dec. 5, 6_2, 18_3, 21_2	» » 149, 363
	Toulouse	1897 Sept. 1_2	B. A. 16, 326
	Wien	» Aug. 24_2	A. N. 150, 21
60 Echo			
= [1899 *E I*]	Arcetri	1899 März 6_2, 7	» » 149, 15
	Arcetri	» März 16, 17, 18, April 6,	
		April 8, 9, 10, 13_2	» » 149, 205
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61 Danaë	Jena	1897 Dec. 26, 27	» » 148, 65
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64 Angelina	Toulouse	1896 Febr. 14_2, 19	» » 16. 175
65 Cybele	Padua	1898 Jan. 21	A. N. 149. 353
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68 Leto	Berlin (Urania)	1897 Febr. 8*	» » 148, 141
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77 Frigga . .	Hamburg . .	1897 Oct. 5, 6	A. N. 149, 147
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79 Eurynome .	Jena . . .	1899 Febr. 10	» » 149, 311
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90 Antiope . .	Heidelberg .	1899 Juli 17*	A. N. 150, 109
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97 Klotho . .	Wien . . .	1892 Aug. 23_2, 24_2	» » 150, 21
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135 Hertha	Toulouse	1897 März 22_2, 23_3, 25_2, 26, 29	B. A. 16, 328
136 Austria	Wien	1898 Febr. 20, März 14	A. N. 149, 289
137 Meliboea	Hamburg	1897 Juli 12, 29, 30, Aug. 3	» » 149, 149
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140 Siwa	Toulouse	1896 Juli 13, 17, 18_2	B. A. 16, 177
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144 Vibilia	Toulouse	1897 Juli 5, 6_2, 8	B. A. 16, 329
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158 Koronis	Toulouse	1896 März 5, 7, 11_2	B. A. 16, 177
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163 Erigone	Wien	1892 Sept. 13_3, 14_2, 15_2	A. N. 150, 23
164 Eva	Marseille	1898 Oct. 25, 26, 27, Nov. 7, 9, Nov. 10	B. A. 16, 141, 311
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169 Zelia	Mt. Hamilton	1898 Sept. 16, 17, 18, 20	A. J. 20, 27
170 Maria	Heidelberg	1899 Juli 17*	A. N. 150, 109
171 Ophelia	Toulouse	1897 Oct. 18, 20	B. A. 16, 330
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175 Andromache	Albany	1897 Jan. 24, 31	A. J. 19, 162
176 Idunna	Arcetri	1898 Mai 16, 18	A. N. 149, 259
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182 Elsa	Toulouse	1897 März 22, 23, 24, 25, 26_2, März 29_2	B. A. 16, 330
184 Dejopeja	Marseille	1898 Oct. 10, 12, 13	» » 16, 141
188 Menippe	Nizza	1897 Aug. 28, Sept. 4	» » 15, 464
190 Ismene	Arcetri	1898 Mai 16, 18	A. N. 149, 259
192 Nausikaa	Wien	» März 27	» » 149, 289
194 Prokne	Hamburg	1897 Aug. 20, 22, 30, Sept. 11	» » 149, 149
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196 Philomela	Toulouse	» Juli 21, 22, 23	B. A. 16, 331
197 Arete	Teramo	1898 Oct. 10, 11	A. N. 149, 49

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210 Isabella	Toulouse	1897 Oct. 21_2, 23, Nov. 30_2	B. A. 16, 331
212 Medea	Berlin (Urania)	1894 Sept. 5*	A. N. 148, 139
213 Lilaea	Marseille	1898 Febr. 12, 14	B. A. 15, 423
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219 Thusnelda	Düsseldorf	» Sept. 9, 17	A. N. 148, 379
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221 Eos	Algier	» März 18_2, 19_2	» » 148, 209,
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222 Lucia = [1899 *EK*]	Wien	1899 März 9_2	» » 149, 15,
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224 Oceana = [1899 *EG*]	Düsseldorf	» März 13, 14	» » 149, 31
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247 Eukrate	Düsseldorf	1898 Jan. 17, 18	» » 148, 379
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263 Dresda	Wien	» Febr. 20?	» » 149, 289
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273 Atropos	Nizza	» Nov. 25	B. A. 15, 464
275 Sapientia	Jena	» März 2, 4	A. N. 148, 69
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313 Chaldaea . .	Paris . . .	1898 Aug. 11_2, 13_2, 16_2 . . .	B. A. 15, 419
	Toulouse . .	1897 April 24, 26_3, 27, 28_2, Mai 4	» » 16, 333
	Wien . . .	1893 Febr. 24_2	A. N. 150, 27
	Wien . . .	1897 April 28	» » 150, 27
317 Roxane . .	Marseille . .	1898 Sept. 8, 9, 10	B. A. 16, 140
	München . .	» Aug. 22_2, Sept. 7_3, 8_2 . .	A. N. 150, 229
	Padua . . .	» Sept. 17, 18, 19, 21, 22 .	» » 149, 357, 150, 327
	Rom . . .	» Sept. 8	» » 149, 307
	Wien . . .	» Sept. 12, 16	» » 149, 291
318 Magdalena .	Teramo . .	» Dec. 11	» » 149, 49
321 Florentina .	Berlin (Urania) .	1896 Nov. 4*	» » 148, 141
	Wien . . .	1898 Febr. 18	» » 149, 291
325 Heidelberga .	Wien . . .	» März 28	» » 149, 291
326 Tamara . .	Wien . . .	1893 Oct. 8_2, Dec. 4, 6, 30, 1894 Jan. 2	» » 150, 27
	Wien . . .	1895 März 1	» » 150, 27
332 Siri . . .	Toulouse . .	1896 Febr. 13	B. A. 16, 179
333 Badenia . .	Wien . . .	1892 Aug. 27_2, 30_2, Sept. 2_2, 11, Sept. 14_2, 20_2	A. N. 150, 27
334 Chicago . .	Albany . . .	1897 April 2, 3, 18, 21 . . .	A. J. 19, 162
	Heidelberg . .	1899 Juli 17*	A. N. 150, 109
	Mt. Hamilton .	1898 Mai 19, Juni 2_2, 3, 9, 10, 23	A. J. 20, 7
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335 Roberta . .	Wien . . .	1892 Sept. 17_2	A. N. 150, 29
336 Lacadiera .	Algier . . .	1898 Mai 9_2, 10_2, 11_2 . . .	» » 148, 211, B. A. 16, 65
342 Endymion .	Berlin (Urania) .	1896 Oct. 5*	A. N. 148, 140
345 Tercidina . .	Arcetri . . .	1898 Mai 24, 25, Juni 12, 13_2, Juni 14, 18, 20, 21, 22 .	» » 149, 259
	Jena . . .	1897 Febr. 3	» » 148, 69
	Padua . . .	1898 Mai 14, 16, 24, 31, Juni 12	» » 149, 355
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	Toulouse . .	1896 Dec. 30_2, 1897 Jan. 4, 8_2, Febr. 1_2	B. A. 16, 178, 334
346 Hermentaria .	Vassar Coll. .	1899 Mai 2, 4, 6	A. J. 20, 76
347 Pariana . .	Düsseldorf . .	1898 März 12, 16, 21 . . .	A. N. 148, 381
	Padua . . .	» März 23	» » 149, 355
	Vassar Coll. .	» März 17	A. J. 20, 29
349 Dembowska .	Jena . . .	1897 Dec. 10, 16, 17	A. N. 148, 69
	Toulouse . .	» Nov. 26_2, 27_3, 29_2, 30_2, Dec. 15_2, 16_2, 17, 23_2	B. A. 16, 334
	Wien . . .	1893 März 4, 30, April 1_2, 2_2, 3_2	A. N. 150, 29

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349 Dembowska .	Wien . . .	1894 Febr. 22_2, 23_2, 25_2, 28,	
		März 2_2, 25, 28, 29_2 . .	A. N. 150, 29
	Wien . . .	1897 Dec. 10_2	» » 150, 29
351 Yrsa . . .	Wien . . .	1893 Jan. 16	» » 150, 29
352 Gisela . .	Düsseldorf . .	1898 Sept. 17	» » 148, 381
	Marseille . .	» Oct. 20, 21, 22	B. A. 16, 141
	München . .	» Oct. 7, 10_2	A. N. 150, 229
354 Eleonora . .	Arcetri . . .	» März 13_2, 16_2, 17_2 . .	» » 149, 273
	Berlin (Urania) .	1894 April 25*, 26*, Mai 9* .	» » 148, 139
	Düsseldorf . .	1898 Febr. 12, 14, 26, 28 . .	» » 148, 381
	Hamburg . .	» April 2	» » 149, 151
	Marseille . .	» Febr. 9, 10, 12, 14, März 15,	
		März 16, 17, 18, April 7, 8,	
		April 9, 12, 13, 15, 18, 19,	
		April 20, 22, 30 . . .	B. A. 15, 423
	Pola . . .	» März 1, 16	A. N. 148, 219
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	Vassar Coll. .	» Febr. 24, 26, 28 . . .	A. J. 20, 29
	Wien . . .	1894 Mai 2	A. N. 150, 29
356 [1893 *G*] . .	Berlin (Urania) .	1896 Oct. 5*, 8*, 9*	» » 148, 140, 141
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	Wien . . .	» März 26, 27, 28 . . .	» » 149, 291
358 [1893 *K*] . .	Wien . . .	» März 21, 26	» » 149, 291
362 [1893 *R*] . .	Berlin (Urania) .	1897 März 3*	» » 148, 141
	Hamburg . .	» April 3	» » 149, 151
363 [1893 *S*] . .	Arcetri . . .	1898 März 22_2, April 15, Mai 10,	
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	Rom . . .	» März 18, April 24, Mai 16 .	» » 149, 305
	Vassar Coll. .	» März 17, 25	A. J. 20, 29
365 [1893 *V*] . .	Wien . . .	» April 30_2, Mai 1 . . .	A. N. 149, 291
366 Vincentina .	Wien . . .	» Febr. 25, März 1	» » 149, 291
371 [1893 *AD*] .	Arcetri . . .	» Sept. 22, 23	» » 149, 261
	München . .	» Sept. 17_2, 18_3, Oct. 7_2 .	» » 150, 229
	Padua . . .	» Sept. 22, Oct. 21_2, 22_2, 23	» » 149, 361
	Rom . . .	» Sept. 22	» » 149, 307
	Wien . . .	» Sept. 16, 18	» » 149, 291
372 [1893 *AH*] .	Wien . . .	1893 Sept. 29, 30	» » 150, 29
375 [1893 *AL*] .	Wien . . .	» Oct. 6, 7, Nov. 14_2 . . .	» » 150, 31
377 [1893 *AN*] .	Arcetri . . .	1898 Dec. 12, 16, 17_2 . . .	» » 149, 275
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377 [1893 *AN*] .	Marseille . .	1899 Jan. 5, 11, 13, 17 . . .	B. A. 16, 311
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379 [1893 *AQ*] .	Heidelberg . .	1898 Nov. 20*, 21*	» » 148, 45
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384 Burdigala .	Padua . . .	1898 Jan. 20, 21	A. N. 149, 353
385 Ilmatar . .	Berlin (Urania) .	1896 Aug. 15*, Sept. 14* . .	» » 148, 140
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	Jena . . .	» Dec. 29, 31, 32 . . .	» » 148, 69
	Vassar Coll. .	1899 April 12, 15, 18 . . .	A. J. 20, 76
	Wien . . .	1894 März 7_2, 8_2, 24_2, 29, 30, April 1, 2, 9, Mai 20_2 . .	A. N. 150, 31
386 [1894 *AY*] .	Jena . . .	1897 Dec. 26, 27	» » 148, 69
	Toulouse . .	1896 Juli 4_2, 9_2, 13_2, 17, 18_3 .	B. A. 16, 178
	Toulouse . .	1897 Dec. 16_2, 17, 23, 27 . .	» » 16, 335
	Wien . . .	1894 März 8	A. N. 150, 31
387 Aquitania .	Albany . . .	1896 Nov. 22	A. J. 19, 162
389 [1894 *BB*] .	Düsseldorf . .	1898 Jan. 17, 18	A. N. 148, 381
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397 [1894 *BM*] .	Arcetri . . .	» Nov. 13, 15, 16, 17 . .	» » 149, 275
	Düsseldorf . .	» Nov. 7, 8, 11, 18, 19_2, Dec. 6	» » 148, 381
	Jena . . .	» Nov. 13	» » 149, 311
	Teramo . .	» Oct. 23	» » 149, 49
402 [1895 *BW*] .	Jena . . .	1899 Febr. 15	» » 149, 311
	Rom . . .	» Febr. 16	» » 149, 307
	Vassar Coll. .	» März 12, 14, 16 . . .	A. J. 20, 47
403 [1895 *BX*] .	Nizza . . .	1897 Nov. 23, 24	B. A. 15, 464
405 [1895 *BZ*] .	Berlin (Urania) .	» Dec. 28*	A. N. 148, 142
409 [1895 *CE*] .	Arcetri . . .	1898 Aug. 9, 10, 11_2, 12, 13, Aug. 14_2, 16, 17, 18, 19, 20	» » 149, 273
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	München . .	» Aug. 5_2, 12_3	» » 150, 229
	Padua . . .	» Aug. 12, 15, 16 . . .	» » 149, 357
	Paris . . .	» Aug. 2_2, 3_2, 4, 5_2, 9, 10_2, Aug. 11_2, 12_2, 13_2, 16 .	B. A. 15, 419
412 Elisabetha .	Arcetri . . .	» Aug. 17, 18, 19, 20_2, 21 .	A. N. 149, 275

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414 [1896 *CN*] .	Toulouse . .	1896 Febr. 11_2, 13, 14 . . .	B. A. 16, 179
416 Vaticana . .	Arcetri . . .	1898 Dec. 4, 5, 6, 7_2, 10, 11,	
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	Teramo . .	» Dec 5	» » 149, 49
	Toulouse . .	1897 Sept. 1_2	B. A. 16, 335
417 [1896 *CT*] .	Wien . . .	1896 Juni 2	A. N. 150, 31
419 [1896 *CW*] .	Marseille . .	1899 Febr. 10, 11, 15, 16 . .	B. A. 16, 278
422 Berolina . .	Berlin (Urania) .	1896 Oct. 5*, 8*	A. N. 148, 140
423 [1896 *DB*] .	Vassar Coll. .	1899 Mai 8, 9, 10, 11 . . .	A. J. 20, 76
424 [1896 *DF*] .	Wien . . .	1898 Mai 15, 17	A. N. 149, 291
426 [1897 *DH*] .	Nizza . . .	1897 Sept. 1, 2, 4	B. A. 15, 464
427 [1897 *DJ*] .	Nizza . . .	» Sept. 2	» » 15, 465
429 [1897 *DL*] .	Nizza . . .	» Nov. 24, 29, Dec. 17, 22 .	» » 15, 465
430 [1897 *DM*] .	Nizza . . .	» Dec. 21, 27, 1898 Jan. 21, 22	» » 15, 465
431 [1897 *DN*] .	Nizza . . .	» Dec. 22, 27, 1898 Jan. 18,	
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432 [1897 *DO*] .	Nizza . . .	» Dec. 21, 27, 1898 Jan. 11,	
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433 Eros . . .	Harvard Coll. (Phot.)	1893 Dec. 19, 27, 1894 Jan. 1,	
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434 Hungaria . .	Besançon . .	1898 Sept. 14, 15, 16 . . .	» » 148, 205, B. A. 16, 69
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435 [1898 *DS*] .	Heidelberg . .	» Sept. 11, 14	» » 148, 45
	Wien . . .	» Sept. 16, 25, Oct. 4, Nov. 9	» » 149, 293
436 [1898 *DT*] .	Heidelberg . .	» Sept. 13_2, 14, 15 . . .	» » 148, 45
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437 [1898 *DP*] .	Marseille . .	» Juli 22, 23, 25, 26 . .	B. A. 15, 468

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437 [1898 *DP*] .	Marseille . .	1898 Aug. 11, 12, 13, 16, 17, 18,	
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438 [1898 *DU*] .	Nizza . . .	» Nov. 8*	» » 147, 399,
			A. J. 19, 156
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439 Ohio . . .	Mt. Hamilton .	» Oct. 14	» » 148, 31
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440 [1898 *EC*] .	Mt. Hamilton .	» Oct. 14	» » 148, 31
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	Mt. Hamilton .	» Oct. 14, 15, 16, 19, 20_2,	
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441 [1898 *ED*] .	Arcetri . . .	» Dec. 12, 13	» » 148, 95
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			C. R. 128, 218
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442 [1899 *EE*] .	Heidelberg . .	1899 Febr. 15, 16	» » 148, 333
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443 [1899 *EF*] .	Heidelberg . .	» Febr. 17, 18, 19 . . .	» » 148, 333
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444 [1899 *EL*] .	Algier . . .	» April 2, 3, 4, 5, 7, 8 . .	C. R. 128, 1033
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444 [1899 *EL*] .	Marseille . .	1899 April 3, 4, 5, 6, 7, 10, 11,	
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1898 *DV* .	Heidelberg . .	1898 Nov. 6*, 13*, 19* . . .	A. N. 148, 45,
			A. J. 19, 156
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			A. J. 19, 156
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1898 *DX* .	Heidelberg . .	» Nov. 6, 13, 19	» » 148, 95
1898 *DY* .	Heidelberg . .	» Nov. 13*, 17*, 18*, 20* .	» » 148, 45,
			A. J. 19, 156
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1898 *DZ* .	Heidelberg . .	» Nov. 17*, 19*, 20* . . .	» » 148, 45,
			A. J. 19, 156
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1898 *EA* .	Heidelberg . .	» Nov. 13, 19	» » 148, 95
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			A. J. 20, 72
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[1]) Als 418 [1896 *CV*] aufgeführt.

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Leipzig	6_2, 7, 8_2, 12_3, 13_2	» » 148, 301
Madison	2, 3, 6, 10, 11, 15	A. J. 19, 170
Mt. Hamilton	5, 6, 7, 10, 11, 13	» » 20, 62
Paris	10, 11, 17, 18	C. R. 127, 805
Strafsburg	2	A. N. 148, 109
Strafsburg	18_2, 19	» » 148, 173, 149, 191
Teramo	13	» » 149, 49
Vassar Coll.	7, 11, 12, 15	A. J. 20, 29
Washington	1, 11, 20	» » 19, 164, 196
Washington	16	» » 20, 13
Wien	7, 9	A. N. 149, 291
	1898 December.	
Denver	5_3, 6_3, 9_3, 10_3, 12_3, 13_3, 14_3, 15_3, 16_3, 17_4, 21_3, 23_3, 26_4, 27_3, 28_3, 31_3	A. J. 20, 51
Greenwich	7, 9	M. N. 59, 89, 398
Königsberg	7_2, 16_2, 17, 19	A. N. 150, 215
Leipzig	5_2, 7	» » 148, 301
Madison	1, 3, 4, 6, 7, 11, 25, 31	A. J. 19, 170
Mt. Hamilton	9, 10, 11, 12, 21, 22, 23, 27	» » 20, 62
Rom	11	A. N. 149, 307
Strafsburg	7, 22	» » 149, 191

(433) EROS. (Fortsetzung.)

Beobachtungsort	Datum der Beobachtung	Publication
	1898 December. (Fortsetzung.)	
Teramo	1, 2, 20	A. N. 149, 49
Washington	1, 5, 9, 23	A. J. 19, 196
Washington	9	» » 20, 13
Wien	8, 14	A. N. 149, 291
	1899 Januar.	
Denver	2_3, 3_3, 4_3, 5_3, 6_3, 7_3, 9_3, 13_3, 14_3, 17_3, 18_3, 19_3, 20_3, 23_3, 31	A. J. 20, 51
Greenwich	10, 25, 26, 27	M. N. 59, 166, 398
Königsberg	11_2, 25	A. N. 150, 215
Leipzig	6_2, 9_2, 10	» » 148, 301
Mt. Hamilton	3, 5, 20, 23, 25, 27, 28, 29, 30	A. J. 20, 62
Straſsburg	9	A. N. 149, 191
Washington	1, 2	A. J. 19, 196
Wien	6	A. N. 148, 217, 149, 291
	1899 Februar.	
Denver	1_3, 6_4, 9_3, 11_3, 14_3, 16_2, 18_3, 23_3, 27_4	A. J. 20, 52
Greenwich	2, 22_2, 24_2, 25, 27_2, 28_2	M. N. 59, 398
Königsberg	6, 8_2, 11	A. N. 150, 217
Mt. Hamilton	6, 7_2, 8_2, 9, 10_2, 11_3, 13_2, 15, 16, 20, 21	A. J. 20, 62
Straſsburg	4, 10_2	A. N. 149, 345
	1899 März.	
Denver	1_3, 9_4, 11_3, 14_2, 15_3, 18_4, 23, 28_4	A. J. 20, 53
Greenwich	5_2, 9, 11, 14_2, 24_2, 27_2, 31	M. N. 59, 398
Königsberg	1	A. N. 150, 217
Mt. Hamilton	5, 11	A. J. 20, 62
Straſsburg	11, 13_2, 16, 17_2	A. N. 149, 345
	1899 April.	
Denver	3_4, 6_4	A. J. 20, 53
Denver	7_3, 10_3, 13_3, 15_3, 20_3, 21_2, 22_3, 26_3, 27_3	» » 20, 103
Königsberg	3, 4, 10	A. N. 150, 217
Mt. Hamilton	4, 7, 10, 12, 14_2, 19, 20	A. J. 20, 62
	1899 Mai.	
Denver	3_3, 4_3, 5_3, 10_4, 11_4, 16_3, 17_2, 18_3	A. J. 20, 103
Mt. Hamilton	4, 5, 9	» » 20, 62

B. Berechnungen.

(Bei den mit einem Sternchen (*) bezeichneten Ephemeriden sind die Planeten-Oerter ausführlicher angegeben.)

Nr. und Name	Ort der Publication	Gegenstand der Publication
24 Themis . .	A. N. 149, 207 .	Elemente, Ephemeride*.
188 Menippe . .	B. A. 16, 38 . .	Bahnbestimmung.
258 Tyche . . .	A. N. 149, 143 .	Elemente, Ephemeride*.
265 Anna . . .	» » 150, 15 .	Elemente, Ephemeride.
303 Josephina . .	» » 150, 109 .	Elemente, Ephemeride*.
306 Unitas . .	» » 149, 303 .	Elemente, Ephemeride*.
334 Chicago . .	» » 149, 123 .	Elemente, Ephemeride.
337 Devosa . .	B. A. 16, 321 .	Elemente.
338 Budrosa . .	» » 15, 414 . .	Bahnbestimmung, Ephemeride.
346 Hermentaria .	A. N. 148, 317 .	Bahnbestimmung, Ephemeride.
347 Pariana . .	B. A. 16, 149 . .	Bahnbestimmung.
	» » 16, 154 . .	Ephemeride*.
358 [1893 *K*] . .	» » 16, 41 . .	Elemente.
366 Vincentina .	» » 16, 143 . .	Bahnbestimmung.
	» » 16, 148 . .	Ephemeride*.
367 [1893 *AA*] .	A. J. 20, 46 . .	Elemente, Ephemeride.
375 [1893 *AL*] . .	A. N. 150, 337 .	Bahnbestimmung, Ephemeride.
390 [1894 *BC*] .	B. A. 16, 43 . .	Bahnbestimmung, Ephemeride.
392 Wilhelmina .	A. N. 150, 311 .	Ephemeride.
425 [1896 *DC*] .	» » 150, 79 .	Ephemeride.
427 [1897 *DJ*] .	B. A. 16, 60 . .	Bahnbestimmung.
429 [1897 *DL*] .	» » 16, 323 . .	Elemente, Ephemeride.
433 Eros . . .	A. N. 147, 335 .	Elemente.
	» » 147, 363 .	Elemente.
	» » 147, 397 .	Elemente.
	» » 148, 27 .	Elemente, Ephemeride.
	C. R. 127, 806 .	Elemente, Ephemeride.
	A. N. 148, 63 .	Ephemeride.
	» » 148, 143 .	Elemente.
	A. J. 20, 61 . .	Elemente.
	A. N. 148, 159 .	Ephemeride.
	» » 148, 191 .	Elemente, Ephemeride.
	» » 148, 271 .	Elemente.
	» » 148, 389 .	Ephemeride.
	A. J. 19, 112 . .	Ephemeride.
	» » 19, 120 . .	Elemente.
	» » 19, 147 . .	Elemente.
	» » 19, 148 . .	Elemente, Ephemeride.
	» » 19, 155 . .	Elemente, Ephemeride.
	» » 19, 161 . .	Elemente, Ephemeride.
	» » 20, 8 . .	Elemente, Ephemeride.
	» » 20, 31 . .	Ephemeride.

Nr. und Name	Ort der Publication	Gegenstand der Publication
434 Hungaria . .	A. N. 147, 351 .	Provisorische Elemente, Ephemeride.
436 [1898 *DT*] .	» » 149, 125 .	Elemente.
438 [1898 *DU*] .	B. A. 16, 123 . .	Elemente.
439 Ohio . . .	A. J. 19, 146 . .	Kreisbahn-Elemente, Ephemeride.
	A. N. 150, 309 .	Elemente.
440 [1898 *EC*] .	A. J. 19, 146 . .	Kreisbahn-Elemente, Ephemeride.
	A. N. 148, 77, 127	Elemente, Ephemeride.
	» » 150, 309 .	Elemente.
441 [1898 *ED*] .	B. A. 16, 139 . .	Provisorische Elemente.
442 [1899 *EE*] .	A. N. 149, 45 . .	Provisorische Elemente, Ephemeride.
443 [1899 *EF*] .	» » 149, 45 . .	Provisorische Elemente, Ephemeride.
444 [1899 *EL*] .	C. R. 128, 1031 .	Elemente.
	» » 128, 1211 .	Elemente, Ephemeride.
[1899 *DW*] .	A. N. 149, 127 .	Kreisbahn-Elemente.
[1899 *DY*] .	» » 149, 127 .	Kreisbahn-Elemente.
[1899 *DZ*] .	» » 149, 127 .	Kreisbahn-Elemente.
[1899 *EA*] .	» » 149, 127 .	Kreisbahn-Elemente.

Erläuterungen zu den Ephemeriden und Tafeln des Jahrbuchs für 1902.

Das Jahrbuch giebt die Oerter der Wandelsterne in zwei Gattungen von Coordinaten an, in Ekliptikal- und Aequatorial-Coordinaten.

Bei den Ekliptikal-Coordinaten ist im allgemeinen als Anfangspunkt der Sonnen-Mittelpunkt angenommen und eine feste Lage der Ekliptik und des Aequinoctiums zu Grunde gelegt.

Bei den Aequatorial-Coordinaten ist als Anfangspunkt der Erd-Mittelpunkt angenommen und die jedesmalige wahre Lage des Aequators und des Aequinoctiums zu Grunde gelegt.

Die Zeitangaben für die im Jahrbuch mitgetheilten Oerter sind überall, wo nicht ausdrücklich eine andere Zeit erwähnt wird, in mittlerer Berliner Sonnen-Zeit ausgedrückt. Die Lage des Berliner Meridians gegen diejenigen Meridiane, auf deren Zeitangaben sich die im Jahrbuch benutzten Sonnen-, Mond- und Planeten-Tafeln begründen, ist nach den neuesten Bestimmungen angenommen:

Berlin östlich von Paris um $44^m\ 13^s.88$,
Berlin östlich von Greenwich um $53^m\ 34^s.91$,
Berlin östlich von Washington (alte Sternw.) um $6^h\ 1^m\ 47^s.00$.

Der Anfang des Tages ist der Mittag; die Zählung der Stunden ist durchgängig bis 24 angenommen worden, so daſs die Stunden unter 12 die Nachmittagsstunden desselben bürgerlichen Tages, die Stunden über 12, wenn man sie um 12 vermindert, die Vormittagsstunden des nächstfolgenden bürgerlichen Tages sind.

Das Jahrbuch enthält auſser den Angaben über die Zeit- und Festrechnung folgende

Hauptabschnitte:

1) Reductions-Elemente.

Die auf Seite 1 gegebene Uebersicht der Reductions-Elemente enthält für die mittleren Mittage von 10 zu 10 Tagen fortschreitend folgende Angaben:

1) Die mittlere Schiefe der Ekliptik, berechnet nach der Angabe von Newcomb (*Tables of the Motion of the Earth,* S. 10), nämlich:

$$\varepsilon = 23^\circ\, 27'\, 8''.26 - 0''.4685\ (t - 1900\ \text{Jan.}\ 0).$$

2) Die scheinbare Schiefe der Ekliptik, entstanden aus der vorhergehenden unter Hinzufügung der Nutation in Schiefe, nämlich:

$$\Delta\varepsilon = +\,0''.5519 \cos 2\odot + 0''.0092 \cos(\odot + 281^\circ\, 15') \\ +\,9''.210 \cos \Omega - 0''.0895 \cos 2\,\Omega.$$

Das kurzperiodische Glied

$$+\,0''.0884 \cos 2\,☾$$

ist hier weggelassen, findet sich aber in der letzten Columne der Sonnen-Ephemeride von Tag zu Tag aufgeführt.

3) Die Praecession in Länge, berechnet mit der Newcomb'schen Praecessions-Constante:

Jährliche Praecession in Länge für 1902: $50''.2568$.

4) Die Nutation in Länge, berechnet aus:

$$-1''.2725 \sin 2 \odot + 0''.1478 \sin(\odot + 81^\circ 56')$$
$$-17''.2318 \sin \Omega + 0''.2070 \sin 2 \Omega.$$

Die kurzperiodischen Glieder

$$-0''.2038 \sin 2 ☾ + 0''.0676 \sin(☾ - \Gamma')$$

sind hier weggelassen, finden sich aber in der Sonnen-Ephemeride in der vorletzten Columne von Tag zu Tag aufgeführt.

Die angegebene Nutation entspricht dem Zeichen nach der Reduction von mittlerer Länge auf wahre.

5) Die Aberration der Sonne, mit der von der Pariser Conferenz angenommenen Constanten $20''.47$ berechnet.

6) Die Parallaxe der Sonne, mit der von der Pariser Conferenz angenommenen Constanten $8''.80$ berechnet.

2) Sonnen-Ephemeride.

Bei der Sonnen-Ephemeride, welche nach den Sonnentafeln von Newcomb (*Astr. Papers* Vol. VI, Part. I) berechnet ist, enthält die linke Seite diejenigen Angaben, welche bei der Beobachtung der Sonne gebraucht werden; ihre Epoche ist der mittlere Berliner Mittag.

Sie enthält aufser dem Datum des Monats und dem Wochentage in sieben neben einander stehenden Columnen:

1) Die Zeitgleichung oder den Unterschied zwischen wahrer und mittlerer Zeit.

2) Die scheinbare Rectascension der Sonne.

3) Die ersten Differenzen dieser Zahlenreihe.

4) Die scheinbare Declination der Sonne.

5) Die ersten Differenzen dieser Zahlenreihe.

6) Die Durchgangs-Dauer der Sonne in Sternzeit.

7) Den scheinbaren Halbmesser der Sonnenscheibe.

Bei der Rectascension und Declination ist die Aberration bereits angebracht, dieselben sind daher direct mit den Beobachtungen vergleichbar.

Gemäfs den Beschlüssen der Pariser Conferenz sind die Nutationsglieder kurzer Periode hier ebenso wie bei den folgenden Planeten-Ephemeriden weggelassen.

Auf der rechten Seite stehen, ebenfalls mit der Epoche des mittleren Berliner Mittags, aufser dem Monats- und Jahrestage in acht Columnen neben einander:

1) Die Sternzeit im mittleren Mittage oder die wahre Rectascension der mittleren Sonne.

2) Die Länge der Sonne bezogen auf die mittlere Ekliptik und das mittlere Aequinoctium 1902.0 (annus fictus).

3) Die ersten Differenzen dieser Zahlenreihe.

4) Die Breite der Sonne bezogen auf die mittlere Ekliptik und das mittlere Aequinoctium 1902.0 (annus fictus).

5) und 6) Der Logarithmus des Radius vector der Sonne mit den Differenzen.

7) und 8) Die von der Mondlänge abhängigen Glieder der Nutation in Länge und Schiefe der Ekliptik, nämlich:

$$d\lambda = -0''.2038 \sin 2☾ + 0''.0676 \sin(☾ - \Gamma')$$
$$d\varepsilon = +0''.0884 \cos 2☾.$$

Die Coordinaten dieser Seite sollen bei Bahnberechnungen und dergleichen dienen, sie sind deshalb frei von Aberration, deren Berücksichtigung nur bei ihrer Anwendung zur Vorausberechnung von Finsternissen erforderlich wäre. Für diesen Fall findet man die Correction, die man von der Länge abziehen mufs, in der vorletzten Columne der Seite 1.

Für die Berechnung des scheinbaren Sonnen-Halbmessers ist nach Professor Auwers 15′ 59″.63 angenommen.

Auf Seite 22—41 folgen die rechtwinkeligen Sonnen-Coordinaten von 12^h zu 12^h mittlerer Zeit, bezogen auf die mittlere Lage des Aequators und Aequinoctiums für den Anfang des *annus fictus* 1902 (1902 Jan. 0.84).

Diese Coordinaten sind bekanntlich mit entgegengesetzten Zeichen die Coordinaten des Erdmittelpunktes gegen den Sonnenmittelpunkt als Ursprung, bezogen auf eine X-Axe, deren positive Richtung in einer durch den Sonnenmittelpunkt parallel der Ebene des Erd-Aequators gelegten Ebene durch die Linie des aufsteigenden Knotens der Erdbahn in dieser heliocentrischen Aequatorial-Ebene bestimmt wird, deren positive Y-Axe in der heliocentrischen Aequatorial-Ebene 90° in der Richtung der Erdbewegung von der X-Axe absteht, und deren positive Z-Axe parallel der Erdaxe nach der nördlichen Seite gerichtet ist.

Neben den Coordinaten stehen von Tag zu Tag die Reductionen derselben auf das mittlere Aequinoctium des benachbarten Jahrzehnt-Anfanges 1900.0 in Einheiten der letzten Decimale; sie dienen zur bequemen Verbindung der Coordinaten-Angaben aufeinanderfolgender Jahre.

3) Mond-Ephemeride.

Von den die Mond-Ephemeride enthaltenden Seiten 42—81 geben die links liegenden Seiten für mittleren Mittag und Mitternacht:

1) Die scheinbare Rectascension des Mondes mit den Differenzen.

2) Die scheinbare Declination des Mondes mit den Differenzen.

3) Den log. Sinus der Aequatorial-Horizontal-Parallaxe des Mondes mit den Differenzen.

4) Den scheinbaren Halbmesser des Mondes.

Unterhalb dieser Columnen sind die Epochen der Mondphasen angegeben.

Auf den rechts liegenden Seiten befinden sich die Angaben, welche die Meridian-Beobachtungen des Mondes und ihre Reduction unterstützen sollen, sowie nach dem Verzeichnifs des *Nautical Almanac* die genäherten Oerter der sogenannten Mondsterne, deren correspondirende Beobachtung in Verbindung mit dem Monde besonders die Genauigkeit der Längenbestimmungen aus Mondculminationen, sowie auch der Parallaxenbestimmungen aus Zenithdistanzen erhöhen soll.

Die abgekürzte Ortsangabe der Mondsterne, welche für die Aufsuchung derselben hinreicht, wird als genügend betrachtet werden können, wenn man bedenkt, dafs der Hauptzweck der Mondstern-Angaben die Herbeiführung correspondirender Beobachtungen derselben ist, dafs aber bei solchen die Oerter dieser Sterne eliminirt werden, und dafs bei einem Mangel an correspondirenden Beobachtungen entweder eine sehr sorgfältige und selbständige Discussion der für die Mondposition zu Grunde zu legenden Sternörter oder die Beziehung derselben auf die Meridian-Beobachtungen benachbarter Fundamental-Sterne eintreten mufs.

Es enthalten auf diesen Seiten:

Die 1. Columne den Monatstag und die Bezeichnung des oberen oder unteren Berliner Meridian-Durchganges des Mondes durch *O* und *U*.

Die 2. Columne die Mittl. Berl. Zeit des Meridian-Durchganges des Mondes.

Die 3. Columne die Rectascension des Mondes zur Zeit der Culmination.

Die 4. Columne die halbe Durchgangs-Dauer in Sternzeit berechnet mit Hülfe des geocentrischen Halbmessers des Mondes und der stündlichen Bewegung in AR.

Die 5. Columne die stündliche Bewegung in Rectascension incl. der Veränderung des Halbmessers, hier für die besonderen Zwecke nicht auf eine Stunde mittlerer Zeit sondern auf das Zeitintervall bezogen, welches zwischen zwei der Epoche benachbarten Durchgängen des Mondes durch zwei um eine Stunde von einander abstehende Meridiane verfliefst.

Die 6. Columne die Declination des Mondes zur Zeit der Culmination.

Die 7. Columne die stündliche Bewegung in Declination (auf dasselbe Intervall bezogen wie die Bewegung in AR.).

Die 8., 9., 10. Columne die Rectascension, Declination und Gröfse der allgemein angenommenen Mondsterne oder Vergleichsterne des Mondes nach dem *Nautical Almanac.* Bei der Auswahl derselben ist das Princip befolgt, dafs von den jedesmal zu benutzenden 4 Sternen die beiden dem Monde folgenden am folgenden Tage als die beiden vorangehenden beobachtet werden. Es gehören also zu jeder oberen Culmination (Berlin) die 4 aufeinanderfolgenden Sterne, deren erster auf gleicher Linie mit der Angabe des zugehörigen Monatstages steht.

Dieselben Seiten enthalten endlich unterhalb jener Columnen die Epochen des Perigaeums und Apogaeums des Mondes.

Von den Mondörtern ist nur eine geringe Anzahl für die Finsternisse direct nach den *Tables de la lune, construites d'après le principe Newtonien de la gravité universelle par P. A. Hansen*, mit Berücksichtigung von *Newcomb's Corrections to Hansen's Tables of the Moon*, berechnet worden; für die Berechnung der Ephemeride ist dagegen die ausführliche Mond-Ephemeride des *Nautical Almanac* benutzt worden, die der Redaction in Folge Uebereinkommens mit der *Nautical Almanac Office* in den Aushängebogen zur Verfügung stand.

4) Ephemeride für den Mondkrater Mösting A.

Die Ephemeride des Mondkraters Mösting A Seite 82—86 dient nach Vorschlag von Professor Franz zwei verschiedenen Zwecken: erstens zur genauen Bestimmung von Mondörtern am Himmel durch Meridianbeobachtung des Kraters, zweitens zur Bestimmung der selenographischen Coordinaten weiterer Punkte der Mondoberfläche durch mikrometrischen Anschlufs derselben an Mösting A aufserhalb des Meridians.

Sie gilt für die obere Culmination in Berlin und enthält für die Tage, an welchen Mösting A innerhalb der Beleuchtungsgrenze liegt, die physische Libration, die Unterschiede $\alpha_{☾} - \alpha_k$ in Rectascension und $\delta_{☾} - \delta_k$ in Declination zwischen der Mondmitte und dem Krater vom Erdmittelpunkt aus gesehen mit ihren Differenzen, endlich den Logarithmus des Sinus der Aequatorialhorizontal-Parallaxe p_k des Kraters, welche hier von der des Mondes $p_{☾}$ zu unterscheiden ist, mit den zugehörigen Differenzen.

Zur Anwendung der Ephemeride auf Meridianbeobachtungen des Kraters interpolire man $\alpha_{☾} - \alpha_k$, $\delta_{☾} - \delta_k$ und $\log \sin p_k$ unter strenger Berücksichtigung der zweiten Differenzen mit dem Argument »Länge des Beobachtungsortes von Berlin« so, dafs westliche Länge positiv, östliche Länge negativ genommen wird. Dann befreie man die beobachtete Declination des Kraters von der Höhenparallaxe, indem man diese in der bekannten

Weise mit dem Argument der wahren Kraterdeclination (nicht Monddeclination), unter Benutzung von p_k, berechnet. Bringt man alsdann $\alpha_☾ - \alpha_k$ und $\delta_☾ - \delta_k$ an die Beobachtung an, so hat man die AR. und Decl. des Mondes, wie sie vom Erdmittelpunkt aus beobachtet wären, für die Beobachtungszeit, d. h. für die Culmination des Kraters (nicht des Mondes).

Für Beobachtungen aufserhalb des Meridians interpolire man $\alpha_☾ - \alpha_k$, $\delta_☾ - \delta_k$ und $\log \sin p_k$ mit dem Argument »westliche Länge von Berlin + westlicher Stundenwinkel des Mondes«. Man findet dann die gesehene, mit Parallaxe behaftete Differenz $\alpha'_☾ - \alpha'_k$ offenbar, indem man die mit $p_☾$ und dem Mondort berechnete Parallaxe $\alpha'_☾ - \alpha_☾$ des Mondes in AR. zu $\alpha_☾ - \alpha_k$ addirt und dann die mit p_k und dem Kraterort berechnete Parallaxe $\alpha'_k - \alpha_k$ des Kraters in AR. subtrahirt. Also

$$\alpha'_☾ - \alpha'_k = \alpha_☾ - \alpha_k + (\alpha'_☾ - \alpha_☾) - (\alpha'_k - \alpha_k) = \alpha_☾ - \alpha_k + \Delta\alpha$$

und ebenso

$$\delta'_☾ - \delta'_k = \delta_☾ - \delta_k + (\delta'_☾ - \delta_☾) - (\delta'_k - \delta_k) = \delta_☾ - \delta_k + \Delta\delta.$$

Man erhält aber die gesuchten kleinen Correctionen $\Delta\alpha$ und $\Delta\delta$, welche stets unterhalb $0^s.7$ und $10''$ bleiben, sicherer aus folgenden Differentialformeln:

$$\begin{aligned}\Delta\alpha &= A_\alpha(\alpha_☾ - \alpha_k) + A_\delta(\delta_☾ - \delta_k) + A_p(1 + 2\,A_\alpha)(p_☾ - p_k)\\ \Delta\delta &= D_\alpha(\alpha_☾ - \alpha_k) + D_\delta(\delta_☾ - \delta_k) + D_p(1 + 2\,D_\delta)(p_☾ - p_k),\end{aligned}$$

wo, wenn wir kurz α, δ, p statt $\alpha_☾$, $\delta_☾$, $p_☾$ schreiben,

$$\begin{aligned}A_\alpha &= \varrho \cos\varphi' \sin p \sec\delta \cos(\alpha - \Theta)\\ A_\delta &= \varrho \cos\varphi' \sin p \sec\delta \sin(\alpha - \Theta) \operatorname{tg}\delta\\ A_p &= \varrho \cos\varphi' \cos p \sec\delta \sin(\alpha - \Theta)\end{aligned}$$

und

$$\begin{aligned}D_\alpha &= \varrho \sin p \sin(\Theta - \alpha) \cos\varphi' \sin\delta\\ D_\delta &= \varrho \sin p\,[\cos(\Theta - \alpha)\cos\varphi' \cos\delta + \sin\varphi' \sin\delta]\\ D_p &= \varrho \cos p\,[\cos(\Theta - \alpha)\cos\varphi' \sin\delta - \sin\varphi' \cos\delta]\end{aligned}$$

sind, oder auch

$$\begin{aligned}D_\alpha &= \varrho \sin p \sin z \sin\eta \sin\delta\\ D_\delta &= \varrho \sin p \cos z\\ D_p &= \varrho \cos p \sin z \cos\eta.\end{aligned}$$

Hier sind ϱ der Erdradius, φ' die geocentrische Breite, Θ die Sternzeit des Beobachtungsortes, z die geocentrische Zenithdistanz des Mondes und η der zugehörige parallaktische Winkel.

Verbindet man die so erhaltenen scheinbaren Abstände zwischen der Mondmitte und Mösting A mit mikrometrischen Messungen zwischen Mösting A und einem zweiten Krater, so erhält man die scheinbare Lage des letzteren gegen die Mondmitte und kann hieraus mit Hülfe von $\alpha'_☾$ und $\delta'_☾$, mit der auf Seite 87 angegebenen Lage des Mond-Aequators

und mit der gleichfalls angegebenen physischen Libration die selenographische Länge und Breite des zweiten Kraters berechnen.

Die Ephemeride ist nach der in den *Astron. Nachrichten* Nr. 3241 § 5 angegebenen Methode mit Benutzung der Mond-Transit-Ephemeride des *Nautical Almanac* berechnet worden.

5) Lage des Mond-Aequators. Mondbewegung.

Die beiden Tafeln auf Seite 87 und 88 dienen neben dem oben angegebenen Zweck zur Berechnung der optischen Libration des Mondes (in Verbindung mit der Tafel auf Seite 366—367) und zur Ermittelung des Winkels C, welchen der Mondmeridian des Mittelpunktes der scheinbaren Mondscheibe mit dem Declinationskreis bildet. Die Formeln für die Berechnung der Libration sind auf Seite 367 vollständig aufgeführt.

Wird bezeichnet mit

i . . . . die Neigung des Mond-Aequators gegen den Erd-Aequator,

Δ . . . das Stück des Mond-Aequators vom aufsteigenden Knoten im Erd-Aequator bis zum aufsteigenden Knoten in der Ekliptik,

☊′ . . . der aufsteigende Knoten des Mond-Aequators im Erd-Aequator,

☊ . . . der aufsteigende Knoten des Mond-Aequators in der Ekliptik,

α, δ . . Rectascension und Declination des Mittelpunktes der Mondscheibe, gesehen vom Beobachtungsort aus,

l', b' . . die Libration in selenocentrischer Länge und Breite,

l_0 . . . die mittlere Länge des Mondes,

$l = l' + l_0$,

so wird

$$\sin C = -\sin i \frac{\cos (l + \Delta - ☊)}{\cos \delta} = -\sin i \frac{\cos (\alpha - ☊')}{\cos b'},$$

wobei C vom nördlichen Theil des Declinationskreises nach Osten positiv gerechnet wird.

Bei der Berechnung von i, Δ, ☊′ ist die Neigung des Mond-Aequators gegen die Ekliptik nach Prof. J. Franz (*Astron. Nachr.* Nr. 2917 und 3241) zu $J = 1° 31' 22''.1$ angenommen worden. Die Angaben sind frei von physischer Libration.

Die in der ersten Columne der Tafel auf Seite 88 aufgeführte Länge des aufsteigenden Knotens der Mondbahn auf der Ekliptik dient auch zur Berechnung der Nutationsausdrücke.

6) Auf- und Untergang von Sonne und Mond für Berlin.

Auf Seite 89—93 sind die Zeiten der Auf- und Untergänge von Sonne und Mond für Berlin in mittlerer Berliner Zeit aufgeführt, welche als Grundlage für die Kalender-Rechnungen benachbarter Orte häufig Verwendung finden.

7) Planeten-Ephemeriden.

Von Seite 94—143 folgen die wahren geocentrischen Oerter der Haupt-Planeten. Dieselben sind für Mercur, Venus und Mars von Tag zu Tag, für Jupiter, Saturn, Uranus und Neptun von 2 zu 2 Tagen gegeben. Ueberall sind den mit der Beobachtung zu vergleichenden Angaben die ersten Differenzen beigefügt, die für eine exacte Interpolation zweckmäſsiger erscheinen, als die Angabe der Bewegung in 1^h Länge.

Sämmtliche geocentrische Coordinaten beziehen sich auf die jedesmalige wahre Lage des Aequators und des Aequinoctiums, sind aber frei von der *Aberratio fixarum*, so daſs man bei ihrer Vergleichung mit den Beobachtungen bekanntlich von den Beobachtungszeiten die jedesmalige Aberrations- oder Licht-Zeit abziehen muſs, dann aber mit den so corrigirten Epochen im Jahrbuche diejenigen wahren Richtungen findet, welche mit den beobachteten scheinbaren, nur von Parallaxe befreiten, direct vergleichbar sind. Dieses Verfahren ist bis zu den Grenzen unseres Planetensystems ausreichend genau, da der Maximal-Fehler desselben nahezu 0″.001 Δ beträgt, also selbst bei Neptun 0″.03 nicht übersteigt.

Die »Log. Δ« überschriebene Columne giebt den für Berechnung der Licht-Zeit und der Parallaxe erforderlichen Werth des Log. der Entfernung der Planeten vom Erdmittelpunkte in der bekannten Einheit ausgedrückt.

Die vorletzte Columne jeder Seite enthält unter der Bezeichnung »Oestlicher Stundenwinkel« des Planeten einen genäherten Werth für die mittlere Zeit seiner oberen Culmination. Die letzte Columne giebt den halben Tagbogen für die im Berliner Mittag stattfindende Declination. Aus beiden Reihen von Werthen wird man alles Erforderliche für Auf- und Untergang leicht ableiten können.

Als Grundlage für die Berechnung haben neben den Newcomb-schen Sonnentafeln gedient:

für Mercur, Venus und Mars die Newcomb'schen Tafeln in *Astronomical Papers*, Vol. VI, Part 2, 3 und 4,

für Jupiter und Saturn die Tafeln von G. W. Hill in *Astronomical Papers*, Vol. VII, Part 1 und 2,

für Uranus und Neptun die Tafeln von Newcomb in *Smithsonian Contributions to Knowledge*.

Die Reductionen auf den wahren Ort sind durchweg mit den im Jahrbuch allgemein angewandten Praecessions- und Nutationsausdrücken berechnet, über welche unten Näheres folgt. Die von der Mondlänge abhängenden Nutationsglieder sind durchweg weggelassen.

Für die Reduction und die Vergleichung der Planetenbeobachtungen mit der Ephemeride ist die Kenntniſs der scheinbaren Halbmesser erforderlich. Man kann für dieselben in der Einheit der Entfernung annehmen:

für Mercur	Halbmesser	. . . . .	3″.34
» Venus	»	. . . . .	8 .78
» Mars	»	. . . . .	4 .68
» Jupiter	»	(Aequatorial)	99 .8
	»	(Polar) . .	92 .6
» Saturn	»	(Aequatorial)	81 .4
	»	(Polar) . .	73 .4
» Uranus	»	. . . . .	34 .7
» Neptun	»	. . . . .	45

8) Heliocentrische Oerter.

Auf die geocentrischen Ephemeriden der Haupt-Planeten folgen Seite 144—148 die heliocentrischen Coordinaten derselben, und zwar der Log. des Radius vector, die Länge in der Bahn und die Reduction auf die Ekliptik, die Breite und bei den Planeten Jupiter, Saturn, Uranus und Neptun noch der Winkel B_0, welchen der Radius vector mit derjenigen Bahnebene macht, für welche die bei jedem Planeten unter den Columnen hinzugefügten Angaben über ☊ und i gelten. (Siehe die ausführlichere Erläuterung im Jahrbuch für 1880 und 1881.)

Da diese heliocentrischen Coordinaten hauptsächlich zur Berechnung der speciellen Störungen dienen sollen, so ist die Genauigkeit und Ausführlichkeit ihrer Angaben dem ihrem Zweck entsprechenden Maſse angepasst worden.

Hinzugefügt sind endlich auſser ☊ und i noch die Angaben betreffend die Masse der Planeten, und zwar:

für Mercur, Venus und (Erde + Mond) nach Newcomb (*Tables of the Sun,* Seite 12),
für Mars nach A. Hall,
für Jupiter nach Newcomb,
für Saturn nach Bessel,
für Uranus und Neptun nach Hill (*Tables of Saturn,* Seite 167).

9) Mittlere Oerter von 622 Fixsternen.

Das Verzeichniſs der mittleren Stern-Oerter für 1902.0 auf Seite 149 bis 166 ist eine ungeänderte Wiedergabe der Auwers'schen Fundamental-Kataloge in Publ. XIV und XVII der Astronomischen Gesellschaft. Auch die Struve'sche Praecessions-Constante, die sonst im Jahrbuch durch die Newcomb'sche ersetzt ist, ist hier zur Ueber-

tragung auf die Epoche 1902.0 beibehalten worden, bez. bei den angegebenen Eigenbewegungen ist diese Constante vorausgesetzt. Diese Mafsregel erschien im Interesse der Continuität erforderlich und wird eingehalten werden bis zur definitiven Annahme des neuen, in der Bearbeitung begriffenen Fundamental-Kataloges von Auwers, von wo an dann das Berliner Jahrbuch sein Fixstern-Verzeichnifs auch über den ganzen südlichen Himmel ausdehnen wird.

Um jedoch schon jetzt in jenen Fällen, wo genauere Oerter wünschenswerth sind, als sie der alte Fundamental-Katalog naturgemäfs bieten kann, den Bedürfnissen der Praxis entgegenzukommen, sind im Anhang I die vorläufigen Verbesserungen des Fundamental-Katalogs aus *Astron. Nachr.* Nr. 3508/09 für 1902.0 abgedruckt und werden auch in den folgenden Jahren gegeben werden. Diese Verbesserungen sind der Redaction in dankenswerthester Weise von Herrn Prof. Auwers zur Verfügung gestellt worden.

Die Uebertragung von 1875.0 auf 1902.0 ist für die Sterne über 70° Decl. durch mechanische Quadratur ausgeführt worden.

Die Angaben für Sirius und Procyon auf Seite 154, 155 sind vermittelst der Elemente IV, bezw. V der citirten Abhandlungen abgeleitet.

10) Scheinbare Oerter von 450 Fixsternen.

Ueber die Auswahl derjenigen Sterne, für welche Ephemeriden scheinbarer Oerter gegeben werden, ist das Jahrbuch für 1883 einzusehen.

Die scheinbaren Oerter der Sterne (Seite 167—307) sind für die neun weniger als 10° vom Pol entfernten Sterne von Tag zu Tag, für die übrigen 441 Sterne von 10 zu 10 Tagen angegeben und beziehen sich auf die Epoche derjenigen oberen Culmination im Berliner Meridian, welche an dem nebenstehenden wahren Sonnentage stattfindet. Der Uebergang einer Culmination auf den vorangehenden wahren Sonnentag ist dadurch bezeichnet, dafs das Datum des Tages, an welchem zwei obere Culminationen stattfinden, vor den Rectascensionen aufgeführt ist.

Am Fufs der Ephemeride für jeden Stern ist der mittlere Ort desselben für den Anfang des Jahres wieder angegeben, aufser bei den Polsternen, für welche an dieser Stelle der Betrag der täglichen Aberration in Rectascension für die Culminationszeit steht. Hierbei liegt der auch auf Seite 312 angegebene Zahlenwerth $0^s.0214$ zu Grunde.

Bei den von 10 zu 10 Tagen fortschreitenden Ephemeriden sind die scheinbaren Oerter auf $0^s.01$ in Rectascension und $0''.1$ in Declination angesetzt, und es ist dabei erstrebt worden, in der Berechnung beider Coordinaten die Fehlergrenze von $0^s.005$, beziehungsweise $0''.05$ nicht merklich zu überschreiten. Die kurzperiodischen Mondglieder der Nutation sind bei der Berechnung weggelassen worden und müssen in den Fällen,

wo ihre Mitnahme wünschenswerth erscheint, nach den Formeln auf Seite 312 und mit Hülfe der Tafel auf Seite 324 u. 325 besonders berechnet werden.

Bei den von Tag zu Tag berechneten scheinbaren Oertern der neun dem Pole nächsten Sterne sind, im Einklange mit der Bedeutung der Hunderttheile der Zeitsecunde für die Rectascensionen dieser Sterne, die Declinationen auf Hunderttheile der Bogensecunde angegeben; bei diesen Sternen sind auch die kurzperiodischen Mondglieder der Nutation angebracht, mit Ausnahme von f'.

Die der Berechnung der scheinbaren Oerter zu Grunde gelegten Constanten der Praecession, Nutation und Aberration entsprechen den Beschlüssen der Pariser Conferenz und sind aus der Formelübersicht Seite 312 zu ersehen. Man sehe hierüber auch den nächsten Abschnitt ein.

Der Betrag der jährlichen Parallaxe ist bei folgenden drei Sternen, bei denen dieselbe ansehnlich und ihrem Werthe nach hinreichend verbürgt ist, nämlich bei

α Canis maj.	mit	der	Parallaxe	0″.38
α Lyrae	»	»	»	0 .18
61 Cygni	»	»	»	0 .51

bereits berücksichtigt.

Als Ergänzung der Sammlung scheinbarer Stern-Oerter dienen die Bessel'schen Constanten a, b, c, d, a', b', c', d' (Seite 308—311) für diejenigen 172 Sterne, von welchen keine Ephemeriden berechnet sind. Es ist zu diesen Constanten, deren Anwendung aus den auf Seite 312 gegebenen Formeln erhellt, nur noch zu bemerken, dafs die Einheit bei a, b, c, d die Zeitsecunde ist.

11) Reductions-Tafeln.

Auf die scheinbaren Oerter der Sterne folgt Seite 312 eine Zusammenstellung der Formeln, nach welchen die Reductions-Constanten der darauf folgenden Tafeln berechnet sind. Hierbei sind die Praecessions-Gröfsen nach Newcomb, die Nutations-Constante 9″.21 und die Aberrations-Constante 20″.47 gemäfs den Beschlüssen der Pariser Conferenz zu Grunde gelegt.

Für den Gebrauch der Reductions-Tafel für die Sterntage 1902 (Seite 313) ist erläuternd hinzuzufügen, dafs derjenige absolute Moment, in welchem die mittlere Sonnenlänge 280° oder die Rectascension der mittleren Sonne = $18^h\ 40^m$ ist, als die Anfangsepoche des astronomischen annus fictus und als der bequeme Ausgangspunkt der Zählung aller scheinbaren Bewegungen der Sterne, die von der Sonnenlänge abhängig sind, angenommen ist. An diesen Moment reihen sich die Epochen der

Tafel (Seite 313) nach Sterntagen. Die Sonne erreicht jene Stellung um $14^h\,42^m.5$ Sternzeit Berlin 1902 Jan. 0. Die Angaben der ersten Columne »Datum in mittlerer Zeit« drücken, von dieser Anfangsepoche beginnend, in Hunderttheilen des mittleren Tages von Berlin die Zeitpunkte aus, welche der Folge der Sternzeiten entsprechen, und für welche die Zahlen der Tafel gelten. Man wird hiernach auf jeden beliebigen Zeitpunkt, gegeben durch mittleres Datum, Sternzeit und Längendifferenz mit Berlin, leicht und sicher übergehen können.

Diese Tafel dient für Berechnung von Stern-Ephemeriden für die Epochen der Meridiandurchgänge, ohne Berücksichtigung der von der Mondlänge abhängigen Nutationsglieder. Wegen ihrer logarithmischen Form ist sie zur Interpolation nicht geeignet. Man wird deshalb mit Vortheil die Interpolation erst nach der Summirung der einzelnen Correctionen, welche unmittelbar für die Epochen der Tafeln berechnet werden können, eintreten lassen.

Die zweite Tafel (Seite 314—323) giebt nach den Anweisungen der Seite 312 für die mittlere Mitternacht Berlin die bekannten Constanten zur Reduction auf den scheinbaren Ort und zwar unter Weglassung der von der Mondlänge abhängigen Nutationsglieder, da diese Tafel überwiegend zu Reductionen bei Vergleichungen von Beobachtungen mit Ephemeriden dienen soll. In der letzten Columne ist jedoch, um die Mondglieder in derselben Form hinzufügen zu können, unter dem Zeichen ☾ das Argument »mittlere Mondlänge« für die Tafeln der Seiten 324 und 325 angeführt, wobei die Peripherie in 1000 Theile getheilt gedacht ist.

Die Tafeln für die schnell veränderlichen Mondglieder der Nutation (Seite 324 und 325) enthalten die Hülfsmittel für die Reductionen auf den scheinbaren Ort in derselben Form wie die vorangehenden beiden Tafeln.

Denselben liegen folgende Formeln zu Grunde:

$$A' = -0.00405 \sin 2☾ + 0.00134 \sin(☾ - 76^\circ\ 5')$$
$$B' = -0.0884 \cos 2☾$$

und

$$f' = -0''.1865 \sin 2☾ + 0''.0618 \sin(☾ - 76^\circ\ 5')$$
$$g' \sin G' = -0.0884 \cos 2☾$$
$$g' \cos G' = -0.0811 \sin 2☾ + 0.0269 \sin(☾ - 76^\circ\ 5').$$

Die hauptsächlichste Vernachlässigung dabei liegt in der für das ganze Jahr constanten Annahme des für 1902.5 berechneten Perigaeums der Mondbahn: $\Gamma' = 76^\circ\ 5'$.

In der Tafel Seite 326—335 sind die Mondglieder mit den Reductions-Constanten vereinigt worden. Um den Gebrauch dieser Tafel zu erleichtern, sind jedesmal an derjenigen Stelle, wo die Werthe einer der vier Constanten A, B, C, D durch Null gehen, neben den logarith-

mischen Angaben die Numeri der betreffenden Constante beigesetzt. Im Uebrigen gilt hinsichtlich der Einrichtung der Tafel dasselbe, was oben über den Gebrauch der Tafel Seite 313 gesagt wurde.

12) Sonnen- und Mond-Finsternisse.

Die Sonnen-Finsternisse sind in der Form berechnet worden, welche Hansen (Theorie der Sonnen-Finsternisse und verwandten Erscheinungen. Abhandlungen der K. Sächsischen Gesellschaft der Wissenschaften IV) der Behandlung dieses Problems gegeben hat.

Die Bezeichnungen und Einführungen von Hansen sind auch im Jahrbuch bei der tabellarischen Aufstellung der Rechnungsresultate durchgängig beibehalten worden, so dafs es genügen wird, zu ihrer Erläuterung auf die erwähnte Abhandlung zu verweisen (siehe besonders die übersichtliche Anführung der einzelnen Formeln von Seite 434 an).

Es wird hier nur erforderlich sein, in aller Kürze anzugeben, auf welche Weise man mit Hülfe der auf Seite 338, 340 und 343 gegebenen Hansen'schen Elemente der Sonnen-Finsternisse Zeit und Umstände der Finsternifs für jeden Ort innerhalb der Grenzcurven berechnen kann.

Der Ort sei gegeben durch seine (nach Osten gezählte) Länge von Berlin . . . λ, oder von Greenwich . . . $\lambda_0 = \lambda + 13^\circ\, 23'.7$ und durch seine geographische Breite φ.

Man bilde zuerst $\tang \varphi_1 = (1 - c) \tang \varphi$, wo c die Abplattung der Erde ist, also $\log (1 - c) = 9.99855$ angenommen werden kann, sodann:

$$\xi = \cos \varphi_1$$
$$\eta = (1 - c) \sin \varphi_1.$$

Hierauf mufs man für die Epoche des fraglichen Phaenomens, sei es nun erste und letzte äufsere oder innere Berührung oder gröfste Phase, einen Näherungswerth der wahren Ortszeit annehmen.

Hierzu kann man die anderweitigen Angaben des Jahrbuches, insbesondere die eventuelle Angabe der Epochen des Eintrittes der gröfsten Phase auf der Centrallinie zu Rathe ziehen. Ein für die erste Annäherung hinreichender und bequemer Näherungswerth der Ortszeit ist $\mu + \lambda$, wo μ die wahre Berliner Zeit der geocentrischen gröfsten Phase ist. (Siehe Elemente der Finsternifs.)

Sei der Näherungswerth der Ortszeit t_0, so bilde man mit Hülfe der in dem Elementen-Verzeichnifs des Jahrbuchs gegebenen Werthe von γ, μ, n, u', f, δ', g, G, k, K, welche man beiläufig mit dem Argumente der wahren Berliner Zeit $\tau = t_0 - \lambda$ entnimmt, folgende Ausdrücke, welche als gemeinsame Grundlage der Annäherung für die Berechnung aller Phasen dienen können:

$$m \sin M = \gamma - \eta \cos g + \xi \sin g \sin (G + t_0)$$

$$m \cos M = (t_0 - \lambda - \mu) \frac{n}{15} - \eta \cos k + \xi \sin k \cos (K + t_0)$$

$$m' \sin M' = -\varkappa \xi \sin g \cos (G + t_0)$$

$$m' \cos M' = n - \varkappa \xi \sin k \sin (K + t_0)$$

$$u_0 = u' - (\eta \sin \delta' + \xi \cos \delta' \cos t_0) \operatorname{tang} f$$

wo $$\varkappa = \frac{15 \cdot 3600}{206265} \qquad \lg \varkappa = 9{\cdot}41797 \cdot$$

Bei der Entnahme von u' und f hat man für innere Berührungen u'_i und f_i, für äufsere Berührungen u'_a und f_a zu wählen.

Hierauf berechnet man:

$$\sin \chi' = \frac{m}{u_0} \sin (M + M')$$

$$t = t_0 - 15 \frac{m}{m'} \cos (M + M') + 15 \frac{u_0}{m'} \cos \chi'$$

wobei man, da zu $\sin \chi'$ ein negativer und ein positiver Werth von $\cos \chi'$ sich ergiebt, zwei Werthe von t (zur ersten oder letzten Berührung gehörig) findet.

Mit jedem dieser beiden Werthe von t rechnet man nun in zweiter Annäherung, wobei die Elemente γ, μ, n, u', f, δ', g, G, k, K mit den wahren Berliner Zeiten $t - \lambda$ aus dem Elementen-Verzeichnifs zu entnehmen sind:

$$m \sin M = \gamma - \eta \cos g + \xi \sin g \sin (G + t_0)$$

$$m \cos M = (t_0 - \lambda - \mu) \frac{n}{15} - \eta \cos k + \xi \sin k \cos (K + t_0)$$

$$m' \sin M' = -\varkappa' \xi \sin g \cos \left[G + \frac{1}{2}(t_0 + t)\right]$$

$$m' \cos M' = n - \varkappa' \xi \sin k \sin \left[K + \frac{1}{2}(t_0 + t)\right]$$

$$u = u_0 + \varkappa' \xi \cos \delta' \operatorname{tang} f \sin \frac{1}{2}(t_0 + t) \frac{(t - t_0)}{15}$$

wo $$\varkappa' = 30 \cdot \frac{\sin \frac{1}{2}(t - t_0)}{t - t_0};$$

$(t - t_0)$ ist hierbei stets in Graden auszudrücken.

Mit den so gefundenen m, m', M, M' und u bildet man dann wieder

$$\sin \chi' = \frac{m}{u} \sin (M + M')$$

$$t = t_0 - 15 \frac{m}{m'} \cos (M + M') + 15 \frac{u}{m'} \cos \chi'.$$

Von den beiden Lösungen für t benutzt man bei der zweiten und den folgenden Näherungen für den Eintritt natürlich nur die zum Eintritt, ebenso bei den Näherungen für den Austritt die zum Austritt gehörige.

Die in zweiter oder dritter Näherung gefundenen Werthe t sind meistens schon genau genug die wahren Ortszeiten des gesuchten Eintritts oder Austritts, und die Positionswinkel (am Sonnenmittelpunkt von der Richtung zum Nordpol nach der Seite der wachsenden Rectascensionen oder nach Osten hin gezählt) der Eintritts- und Austritts-Punkte sind mit den beiden Werthen von χ', die der Sinus ergiebt:

$$\vartheta = N' + M' - \chi',$$

wo N' aus dem Elementen-Verzeichnifs zu entnehmen ist.

Um die Zeit der gröfsten Phase zu berechnen, kann man zunächst die Werthe t_0, m, m', M, M' aus der obigen ersten Annäherung benutzen und damit bilden:

$$t_{\rm I} = t_0 - 15 \frac{m}{m'} \cos(M + M').$$

Mit dem so gefundenen Werthe $t_{\rm I}$ bildet man für die Epoche $t_{\rm I} - \lambda$ wieder die Werthe der Elemente und berechnet damit in zweiter Annäherung die Werthe m, m', M, M', indem man in den Gleichungen der ersten Annäherung t_0 durchgängig mit $t_{\rm I}$ vertauscht. Man hat dann den genaueren Werth der Ortszeit der gröfsten Phase:

$$t = t_{\rm I} - 15 \frac{m}{m'} \cos(M + M')$$

und zur Controle für diese Zeit $M + M' = 90°$ oder $= 270°$, je nachdem der Mond-Mittelpunkt nördlich oder südlich vom Sonnen-Mittelpunkt vorbeigeht.

Zur Bestimmung der Gröfse der Verfinsterung hat man zugleich:

$$u = m,$$

welcher Werth bei centraler Verfinsterung $= 0$ wird.

Die Gröfse in Theilen des Durchmessers i findet man mit einer für diese rohe Angabe genügenden Näherung:

$$i = \frac{u'_a - u}{u'_a - u'_i} \cdot \cdot \cdot \cdot$$

Die Angaben über die Hauptumstände der Sonnen-Finsternifs 1902 Oct. 30 (Seite 345 und 346) sind hauptsächlich zum Gebrauch für die innerhalb Deutschlands gelegenen Orte bestimmt, umfassen aber auch die nördlich und südlich an Deutschland sich anschliefsenden Ländergebiete. Der Gebrauch der Tafel ist unmittelbar aus deren Einrichtung und den an Ort und Stelle hinzugefügten Bemerkungen zu ersehen.

Zu den Angaben über die Mond-Finsternisse (Seite 339 und 342) sei bemerkt, dafs als Vergröfserungsfactor des Erdschattens $\frac{1}{50}$ angenommen wurde.

13) Stern-Bedeckungen durch den Mond.

Bei den Stern-Bedeckungen findet man zunächst (Seite 347 und 348) ein Verzeichnifs derjenigen helleren Sterne (bis zur 5.5. Gröfse), welche im Laufe des Jahres 1902 für irgend einen Ort der Erdoberfläche vom Monde bedeckt werden können. Die Gröfsenangaben beruhen zum gröfsten Theil auf den Schätzungen von Argelander und Heifs, in einzelnen wenigen Fällen sind aufserdem für diese Angaben die Schätzungen Gould's benutzt; die mittleren Oerter sind nach den Angaben verschiedener Kataloge mit Berücksichtigung der Eigenbewegung auf 1902.0 reducirt.

Hierauf folgen in den zweispaltigen Seiten 349—354 die Hülfsmittel zur Berechnung der einzelnen Bedeckungen:

in der 1. Columne die Nr. des Sternes, welcher bedeckt wird, nach dem voranstehenden Verzeichnisse;

in der 2. Columne die Zeit der geocentrischen Conjunction in AR. von Stern und Mondmittelpunkt in Monatstagen, Stunden und Minuten;

in der 3., 4. und 5. Columne die Werthe folgender Ausdrücke:

$$q = \frac{\delta - D}{\pi} \qquad p' = \frac{\Delta\alpha \, . \cos\delta}{\pi} \qquad q' = \frac{\Delta\delta}{\pi}$$

p' und q' in Einheiten der 4. Decimale.

In diesen Ausdrücken bedeutet:

δ die geocentrische Declination des Mondes für die geocentrische Conjunctions-Zeit T.

π die Aequatorial-Horizontal-Parallaxe des Mondes für die geocentrische Conjunctions-Zeit T.

D die Declination des Sternes.

$\Delta\alpha$ und $\Delta\delta$ die Veränderung der geocentrischen Rectascension und Declination des Mondes (bezw. vermindert um die Veränderung des Planetenortes bei den Planetenbedeckungen), für eine Stunde mittlere Zeit, gültig für die Conjunctions-Zeit T.

Nennt man ferner die geocentr. AR. des Mondes zur Zeit $T \ldots \alpha$, die AR. des Sternes ... A, den geocentr. scheinbaren Halbmesser des Mondes ... r, die Längendifferenz des Beobachtungsortes gegen Berlin ... d (östlich positiv), die der mittleren Zeit $T+d$ entsprechende Sternzeit des Ortes ... μ, seine geocentrische Breite ... φ', seinen geocentrischen Radius vector in Theilen des Radius des Aequators ... ϱ; setzt man endlich (nach J. Peters *Astron. Nachr.* 3297)

$$\frac{r}{\pi} = k = 0.2725, \qquad \log k = 9.4354$$

$$\text{und } \log(15 \, . \, 3609.9 \sin 1'') = \log \lambda = 9.41916,$$

so wird die Aufgabe der Vorausberechnung der Ortszeit etc. für die betreffende Bedeckung in Verbindung mit den obigen in den Tafeln gegebenen Werthen gelöst durch die Bildung folgender Ausdrücke und die Ausführung folgender Rechnungen (nach Bessel's Näherungsformeln im Jahrbuch für 1831):

$$p = \frac{(\alpha - A)\cos\delta}{\pi} \quad (= 0 \text{ für das Zeitmoment } T)$$

$$u = \varrho \cos\varphi' \sin(\mu - A)$$

$$v = \varrho \sin\varphi' \cos D - \varrho \cos\varphi' \cos(\mu - A) \sin D$$

$$u' = \lambda\varrho \cos\varphi' \cos(\mu - A) \qquad = \left(\frac{du}{dt}\right).$$

$$v' = \lambda\varrho \cos\varphi' \sin(\mu - A) \sin D \qquad = \left(\frac{dv}{dt}\right)$$

$$m \sin M = p - u \qquad n \sin N = p' - u'$$

$$m \cos M = q - v \qquad n \cos N = q' - v'$$

(m und n stets positiv)

$$\tau = -\frac{m}{n}\cos(M - N).$$

Die Momente des Eintritts und des Austritts T_1 und T_2 des Sternes werden dann gefunden, wenn noch $\cos\psi = \frac{m \sin(M-N)}{k}$ (wo ψ immer kleiner als 180°) berechnet ist:

$$T_1 = T + d + \tau - \frac{k}{n}\sin\psi \qquad T_2 = T + d + \tau + \frac{k}{n}\sin\psi.$$

Die Oerter des Eintrittes und Austrittes an der Mondscheibe in dem auf Seite 494 erläuterten Positionswinkel-Ausdruck sind:

$$Q_1 = N - 90° + \psi \qquad Q_2 = N - 90° - \psi.$$

Die so gefundenen Resultate werden indeſs von der Wahrheit sehr entfernt sein können, wenn die Correction τ, welche zu der Ortszeit der geocentrischen Conjunction hinzugefügt werden muſs, um die Ortszeit des auf den Beobachtungsort bezüglichen kleinsten Abstandes des Sterns vom Mondmittelpunkt zu finden, sehr beträchtlich ist; mit anderen Worten, wenn an dem betreffenden Ort zur Zeit $T + d$ der Stundenwinkel des Mondes groſs ist. In diesem Falle nämlich ist hauptsächlich die Berechnung der der Zeit folgenden Veränderungen von u und v durch die ersten Differential-Quotienten u' und v' bei der starken Aenderung des Winkels $(\mu - A)$ nicht mehr genügend, sondern man muſs jetzt die zweite Näherung ausführen, indem man für die Ortszeit $T + d + \tau$ oder die Berliner Zeit $T + \tau = T_0$ berechnet:

$$p_0 = \tau p' \qquad q_0 = q + \tau q' \qquad \mu_0 = \mu + \tau + \varepsilon \qquad t = \mu_0 - A$$

(wo ε die Reduction des mittleren Zeitintervalles τ auf Sternzeit bedeutet)

$$u = \varrho \cos \varphi' \sin t$$
$$v = \varrho \sin \varphi' \cos D - \varrho \cos \varphi' \sin D \cos t$$
$$u' = \lambda \varrho \cos \varphi' \cos t$$
$$v' = \lambda \varrho \cos \varphi' \sin D \sin t.$$

Berechnet man mit diesen Werthen

$$\varDelta\tau = -\frac{m}{n} \cos(M - N),$$

so wird diese Näherung schon ziemlich ausreichend sein, um die Zeiten und Oerter des Eintrittes und Austrittes zu finden, wie oben:

$$\cos\psi = \frac{m \sin(M - N)}{k}$$

$$T_1 = T + d + \tau + \varDelta\tau - \frac{k}{n} \sin\psi \text{ u. s. w.}$$

Bei der Berechnung der ersten Näherung, welche τ ergiebt, wird es aber nicht nöthig sein, nach den ausführlichen Formeln bis

$$\tau = -\frac{m}{n} \cos(M - N)$$

zu rechnen, sondern man wird eine wesentliche Abkürzung und eine hinreichende Convergenz der Näherung erreichen, wenn man setzt:

$$\tau = \frac{u}{p' - u'} \dots\dots$$

Wenn man hier noch statt des jedesmaligen, in den Elementen der Sternbedeckungen angegebenen p' den Durchschnittswerth 0.5646 annimmt, läfst sich der Ausdruck

$$\tau = \frac{\varrho \cos \varphi' \sin(\mu - A)}{0.5646 - \lambda\varrho \cos \varphi' \cos(\mu - A)}$$

für eine bestimmte Polhöhe φ' sehr leicht mit dem Argumente des Stundenwinkels $(\mu - A)$ in eine Hülfstafel bringen, aus der man ohne Mühe den zur ersten Näherung hinreichenden Werth von τ bei westlichem Stundenwinkel positiv, bei östlichem negativ entnimmt.

Um für jeden Ort die erste Correction τ in Minuten ausgedrückt zu finden, kann die Tafel Seite 499 mit dem Horizontal-Argument »φ'« und dem Vertical-Argument »Stundenwinkel« dienen. Zur genäherten Bildung des letzteren Argumentes werden die Columnen der Mond-Ephemeride, welche »Mond im Meridian« überschrieben sind, von Nutzen sein können.

Für Orte, die nicht zu weit von Berlin entfernt sind, wird man aus dem für Berlin gegebenen Verzeichnifs häufig schon ersehen können, ob eine Sternbedeckung stattfindet oder nicht; für näher gelegene Orte dürfte es in diesem Falle schon genügen, wenn man an die für Berlin gegebenen Zeiten des Ein- und Austrittes nur die Längendifferenz anbringt. Wenn nämlich die Sehne vom Punkte des Eintrittes zu dem des Austrittes dem Mondmittelpunkt nahe liegt, so müfste der Unterschied der Parallaxe

für Berlin und den andern Ort schon nahe den Betrag des Mondhalbmessers erreichen, wenn dort die Sternbedeckung nicht sichtbar sein sollte; für nahe liegende Orte sind die Wirkungen kleiner Unterschiede der Parallaxen gerade in diesem Falle sehr gering.

Um allgemein für irgend einen Ort, dessen östliche Länge d und dessen geocentrische Breite φ' näherungsweise bekannt sind, im voraus zu bestimmen, welche Sternbedeckungen sichtbar werden, hat man nach den im Jahrbuch gegebenen Elementen folgendes zu beachten:

Nach den Angaben der Mond-Ephemeride kennt man die Zeiten des Meridiandurchganges des Mondes (M) und seine Declination (δ), wie die Declination der Sonne. Nachdem man dann $(T + d)$ gebildet, wird man mit Hülfe einer Tafel der halben Tagbögen (wie sie in den Handbüchern der Nautik für alle Breiten sich berechnet finden) meist sogleich entscheiden können:

1) Ob Ein- und Austritt nach Sonnenuntergang und Mondaufgang oder vor Sonnenaufgang und Monduntergang stattfinden. Auf die Vergröfserung des Tagbogens durch die Bewegung des Mondes und auf die Parallaxe desselben ist vorläufig hierbei keine Rücksicht geboten, da die Wirkungen derselben in ihren mittleren Werthen mittelst der Tafel Seite 499 durch τ berücksichtigt werden. — Nur die Bedeckungen hellerer Gestirne (bis 2. Gr.) können auch bei Tage beobachtet werden. Die Beobachtung des Eintrittes schwächerer Sterne kurz nach Sonnenuntergang oder des Austrittes kurz vor Sonnenaufgang werden oft durch örtliche oder atmosphärische Verhältnisse gehindert.

Aus nachstehender Tafel, in welcher τ das Zeichen des Stundenwinkels hat, erhält man sogleich mit φ' und $T + d - M$ einen Näherungswerth für τ und hiermit den genäherteren Stundenwinkel $t = T + d - M + \tau$ und $q_0 = q + \tau q'$. Einen genäherten Werth von v erhält man durch Berechnung von

$$\sin(\varphi' - D) + \cos\varphi' \sin D (1 - \cos t) \;{}^{*)}.$$

2) Ist nun $q_0 - v < k$ $(k = 0.27)$, so findet in der Regel eine Bedeckung statt, im entgegengesetzten Falle nicht. Da aber τ zuerst nur annäherungsweise bekannt ist, so mufs, wenn $q_0 - v$ dem Werthe von k nur nahe kommt, eine ausführlichere Berechnung angestellt werden. In vielen Fällen dieser Art genügen indefs schon einige weitere Betrachtungen zur Entscheidung, ob der aus der Tafel entnommene Werth von τ dem wahren Werthe von τ sehr nahe kommt, gröfser oder kleiner ist. Man wird nämlich leicht entscheiden können, ob $(q' - v')$ sehr klein, positiv oder negativ wird, das Zeichen von $(q_0 - v)$ ist in den erwähn-

*) Um für einen Ort eine allgemeine, für diesen Zweck genügende Tafel der v zu bilden, hat man höchstens 5 Werthe von $\sin(\varphi' - D)$ und 2 Werthe von $\cos\varphi' \sin D$ auf 2 oder 3 Stellen zu berechnen.

φ'

t	0°	8°	16°	24°	32°	40°	48°	56°	64°	72°	t
h m	m	m	m	m	m	m	m	m	m	m	h m
0 0	0	0	0	0	0	0	0	0	0	0	0 0
20	17	17	16	15	13	11	9	7	5	3	20
40	34	33	32	29	26	22	18	14	10	7	40
1 0	50	49	47	43	38	32	26	21	15	10	1 0
20	65	63	60	55	49	42	34	27	20	13	20
40	78	76	73	67	59	51	42	33	24	16	40
2 0	89	88	84	77	68	59	49	38	28	19	2 0
20	98	97	93	85	76	66	55	43	32	21	20
40	106	105	100	93	83	72	60	48	36	24	40
3 0	112	110	106	98	89	77	65	52	39	26	3 0
20	116	115	110	102	93	81	68	55	41	28	20
40	119	117	113	105	96	84	71	57	43	29	40
4 0	120	119	114	107	97	86	73	59	45	31	4 0
20	120	118	114	107	98	87	74	61	46	32	20
40	119	117	113	107	98	87	75	61	47	33	40
5 0	117	115	112	106	97	87	75	62	48	33	5 0
20	114	113	109	103	95	86	74	62	48	33	20
40	110	109	106	101	93	84	73	61	47	33	40
6 0	106	105	102	97	90	82	71	60	47	33	6 0
20	102	101	98	93	87	79	69	58	46	32	20
40		96	93	89	83	76	67	56	44	32	40
7 0			88	84	79	72	64	54	43	31	7 0
20			83	80	75	68	61	51	41	30	20
40				75	70	64	57	49	39	28	40
8 0					65	60	53	46	37	27	8 0
20						55	49	42	34	25	20
40							45	39	32	23	40
9 0							41	36	29	21	9 0
20								32	26	19	20
40								28	23	17	40
10 0								24	20	15	10 0
20									17	12	20
40									13	10	40
11 0									10	7	11 0
20									7	5	20
40										3	40
12 0										0	12 0

ten zweifelhaften Fällen sehr bestimmt zu erkennen. Der Werth von u hängt für eine bestimmte Breite des Ortes nur von $\sin t$ ab und kann nie gröfser als $\cos \varphi'$ werden. — Hiernach gilt folgende Regel:

3) Sind $(q_0 - v)$ und $(q' - v')$ gleichnamig (beide positiv oder beide negativ), so mufs $p_0 - u = \tau p' - u$ negativ, sind jene ungleichnamig, so mufs $\tau p' - u$ positiv, ist $(q' - v')$ sehr klein (also das Vorzeichen noch unbestimmt), so mufs $\tau p'$ nahe gleich u werden, wonach man den Tafelwerth von τ sogleich um ein oder ein paar Zehntel der Stunde im richtigen Sinne verbessern kann.

Seite 355 enthält die Vorausberechnung der Stern-Bedeckungen für Berlin.

14) Jupiters-Trabanten und Saturns-Ring.

Auf die Stern-Bedeckungen folgen Seite 356—361 die Erscheinungen der vier älteren Jupiters-Trabanten, und zwar für sämmtliche Trabanten zunächst die Angaben, aus denen man den Ort derselben, wie sie vom Mittelpunkte der Erde aus gesehen zu einer beliebigen Zeit in Bezug auf den Mittelpunkt der Jupiterscheibe erscheinen, herleiten kann, sodann die Zeitangaben für die Verfinsterungen derselben in dem Schattenkegel des Jupiter, welche von ihrem Stande gegen die Sonne abhängen. Bei den Verfinsterungen ist für die beiden inneren Trabanten die Zeit des Ein- oder Austritts, für die beiden äufseren Trabanten die Mitte der Verfinsterung und ihre halbe Dauer angegeben, alles in mittlerer Berliner Zeit und so, wie man die Erscheinung unmittelbar beobachten kann.

Für den geocentrischen Ort ist die Zeit der jedesmaligen scheinbaren oberen Conjunction des Trabanten mit der Erde, oder die Zeit, wann Jupiter sich in einer auf die Ebene der Trabantenbahn senkrecht gelegten Ebene zwischen der Erde und dem Trabanten befindet, angesetzt. Für jeden Trabanten sind in den Jahrbüchern bis zum Jahrgang 1871 Hülfstafeln gegeben, welche für die mittlere synodische Umlaufszeit die Abscissen und Ordinaten des Ortes des Trabanten in seiner als kreisförmig angenommenen Bahn ergeben. Die Axe der Abscissen liegt senkrecht auf der Conjunctions-Ebene, beide Coordinaten natürlich in der Ebene der Trabantenbahn und ihr Anfangspunkt im Mittelpunkte der Jupiterscheibe. Die Einheit, in welcher die Coordinaten ausgedrückt sind, ist der Halbmesser des Jupiter. Die kreisförmige Bahn wird sich der Erde als eine Ellipse darstellen, deren kleine Axe in der Conjunctions-Ebene liegt, so dafs die Abscissen ungeändert bleiben, die Ordinaten aber in dem Verhältnifs der halben kleinen zur halben grofsen Axe vermindert werden müssen. Dieses Verhältnifs, und zwar $\frac{b}{a}$, ist neben den Zeiten der oberen Conjunction angesetzt. Wünscht man nun für eine

Zeit T, welche zwischen zwei auf einander folgende Zeiten t und t' der oberen Conjunction fällt, den Ort des Trabanten zu haben, so geht man mit dem Argument

$$T - t$$

in die Hülfstafeln ein, nimmt daraus die entsprechenden Werthe von x und y', und hat damit in Halbmessern des Jupiter den Stand des Trabanten, in Bezug auf den Mittelpunkt des Jupiter, gegeben durch

$$x \text{ und } y = y' \frac{b}{a}$$

wobei man die Zeichen von x, y' und $\frac{b}{a}$ zu berücksichtigen hat. Das Zeichen der letzten Gröfse deutet an, welche Fläche der Trabanten-Bahn man sieht, ob die obere (nördliche, dem Nordpole der Ekliptik zugewandte bei positivem $\frac{b}{a}$), oder die untere (südliche).

Die Zeichen von x und y sind so gewählt, dafs für Berlin zur Zeit der Culmination der Trabant für den Anblick im Fernrohre bei positivem x rechts, bei negativem x links vom Jupiter erscheint; bei positivem y ist er nördlich und beim negativen y südlich von einer Linie, welche mit den Streifen parallel durch das Centrum des Jupiter gezogen werden kann.

Man könnte hier mit Leichtigkeit noch eine kleine Correction anbringen, wenn die Zwischenzeiten zweier auf einander folgenden oberen Conjunctionen beträchtlich von der mittleren synodischen Umlaufszeit verschieden wären. Wäre die letztere T', so würde man mit dem Argument

$$(T - t)\frac{T'}{t' - t}$$

eingehen müssen. Ebenso findet man die Vorübergänge der Trabanten vor der Jupiterscheibe durch die Zeiten der unteren Conjunction, das Mittel aus den oberen, und die Ein- und Austritte der Trabanten in die Jupiterscheibe durch die Zeiten, zu denen

$$\sqrt{x^2 + y^2} = 1,$$

wobei man von der elliptischen Gestalt des Jupiter absieht. Indessen sind diese letzteren Momente nur als beiläufige Näherungen zu betrachten, da für diese feineren und genaueren Bestimmungen die Tafeln sich nicht einfach genug einrichten liefsen, und aus gleichem Grunde wird die ersterwähnte Verbesserung wegen des Unterschiedes zwischen der wahren und mittleren synodischen Umlaufszeit unnöthig sein.

Statt auf die in den früheren Jahrbüchern gegebenen Elongations-Tafeln zurückzugreifen, kann man auch leicht die Coordinaten der Trabanten aus den folgenden Formeln berechnen:

$$\left.\begin{aligned} x &= (0.7559)\ \sin\ [203^\circ.40\ .\ t] \\ y' &= (0.7559)\ \cos\ [203^\circ.40\ .\ t] \end{aligned}\right\}\ \text{Trabant I.}$$

$$\left.\begin{aligned} x &= (0.9576)\ \sin\ [101^\circ.29\ .\ t] \\ y' &= (0.9576)\ \cos\ [101^\circ.29\ .\ t] \end{aligned}\right\}\ \text{Trabant II.}$$

$$\left.\begin{aligned} x &= (1.16017)\ \sin\ [50^\circ.235\ .\ t] \\ y' &= (1.16017)\ \cos\ [50^\circ.235\ .\ t] \end{aligned}\right\}\ \text{Trabant III.}$$

$$\left.\begin{aligned} x &= (1.40552)\ \sin\ [21^\circ.488\ .\ t] \\ y' &= (1.40552)\ \cos\ [21^\circ.488\ .\ t] \end{aligned}\right\}\ \text{Trabant IV.}$$

wo t die seit der letzt vorangehenden oberen Conjunction verflossene Zeit bezeichnet, ausgedrückt in Tagen, und wo die eingeklammerten Zahlen Logarithmen bedeuten. Die zu Grunde gelegten Werthe der mittleren Entfernungen vom Jupiterscentrum (in Halbmessern der Jupiterscheibe) und die synodischen Umlaufszeiten sind beziehungsweise:

Trabant	I.	5.70	1^d	18^h	$28^m.6$
»	II.	9.07	3	13	17 .9
»	III.	14.46	7	3	59 .6
»	IV.	25.44	16	18	5 .1

Die Angaben für die Jupiters-Trabanten sind nach den Tafeln von Damoiseau und der Fortsetzung derselben von Pottier berechnet.

Ueber die Verbesserungen, deren die Damoiseau'schen Tafeln und die danach berechneten Verfinsterungen der Trabanten bedürftig sind, ist in dem Jahrbuche für 1880 Näheres an dieser Stelle mitgetheilt worden.

Auf Seite 362 stehen die Angaben für die Lage und Gröſse des Saturns-Ringes, deren Bedeutung dort hinzugefügt ist. Es liegen folgende Bestimmungen nach Bessel zu Grunde:

Aufsteigender Knoten des Saturns-Ringes auf der beweglichen Ebene der Ekliptik . . . . $= 166^\circ\ 53'\ 8''.9 + 46''.462\ (t-1800)$
Neigung gegen dieselbe . . . . $= 28\ \ 10\ \ 44\ .7 - 0\ .350\ (t-1800)$

Durchmesser des Ringes in der Entfernung, deren Logarithmus $= 0.9796480$ . . . . . $= 39''.311$.

15) Constellationen.

In der Uebersicht der Constellationen des Jahres 1902 (Seite 363 bis 365) sind die hauptsächlichsten Planeten-Constellationen gegeneinander und gegen Sonne, Mond und die Sterne 1. und 2. Gröſse, sowie die An-

gaben der Epochen, zu welchen sich die Planeten in gewissen Hauptpunkten ihrer Bahn und ihres synodischen Laufes befinden, zusammengestellt. Die Bedeckungen der Planeten und der helleren Fixsterne (bis 2. Gröſse) durch den Mond auf der Erde überhaupt sind hier ebenfalls nochmals mit aufgeführt. — Die Conjunctionen der Planeten mit dem Mond und untereinander sind als Conjunctionen in AR. zu verstehen. Die Epochen der gröſsten Helligkeit der Venus sind nach derjenigen Formel für die Lichtstärke, welche G. Müller in der *Publ. des Astrophys. Obs. zu Potsdam,* Bd. VIII, Seite 197 ff. gegeben hat, berechnet.

Als Abkürzungen sind in dieser Uebersicht folgende gebraucht:

♈ Widder.	☉ Sonne.	
♉ Stier.	☾ Mond.	
♊ Zwillinge.	☿ Mercur.	☌ Conjunction.
♋ Krebs.	♀ Venus.	□ Quadratur.
♌ Löwe.	♁ Erde.	☍ Opposition.
♍ Jungfrau.	♂ Mars.	
♎ Waage.	♃ Jupiter.	☊ Aufsteigender } Knoten.
♏ Scorpion.	♄ Saturn.	☋ Niedersteigender } Knoten.
♐ Schütze.	♅ Uranus.	
♑ Steinbock.	♆ Neptun.	
♒ Wassermann.		
♓ Fische.		

16) Hülfstafeln.

Es folgt eine Reihe von häufig gebrauchten Hülfstafeln.

1) Die Tafel zur Berechnung der Mondlibration (Seite 366 und 367) reproducirt (mit einer neuen Annahme über J berechnet) die bekannte Encke'sche Tafel (Berl. Jahrb. 1843); sie gestattet in Verbindung mit den Angaben der Seite 88 die rasche Berechnung der optischen Libration in selenocentrischer Länge und Breite nach den Formeln, die auf Seite 367 vollständig aufgeführt sind. Hierbei scheint die Kenntniſs der wahren Längen und Breiten des Mondes nothwendig zu sein, welche im Jahrbuch vermisst werden; indessen werden die Längen und Breiten zu diesem Zweck mit merklichem Vortheil aus der mit Hinzufügung der Parallaxe berechneten AR. und Decl. abgeleitet, wozu man sich der gewöhnlichen Umwandlungsformeln oder, wenn nicht gröſsere Genauigkeit erfordert wird, der Encke'schen Hülfstafel im Berl. Jahrbuch 1831 bedienen kann.

2) Eine Tafel mit Angabe der Bruchtheile des tropischen Jahres, die den nebenstehenden mittleren Daten (0^h Mittl. Zeit Berlin) entsprechen. (Seite 368 und 369.)

3) Eine Tafel für die Ermittelung eines Datums in der julianischen Periode. (Seite 370 und 371.)

4) Die Hülfstafeln zur Verwandlung von mittlerer Zeit und Sternzeit (Seite 372 und 373).

5) Eine Tafel zur Verwandlung von Stunden, Minuten und Secunden in Decimaltheile des Tages und umgekehrt (Seite 374 und 375).

6) Eine Tafel mit Angabe der Hülfsgröſsen zur Berechnung der Praecession von den hauptsächlichsten Sternkatalog-Epochen bis 1902.0 (Seite 376). Diese Tafel ist der Redaction von Prof. Kreutz gütigst zur Verfügung gestellt worden.

17) Coordinaten der Sternwarten.

Die Seiten 377 bis 383 enthalten die geographischen und geocentrischen Coordinaten der Sternwarten.

Die Seehöhen sind in allen Fällen angegeben worden, wo sie sich einigermaſsen sicher ermitteln lieſsen; zumeist sind sie dem Verzeichniſs von Prof. Auwers im *Geographischen Jahrbuch* entnommen worden; bei der Berechnung von log ϱ sind sie berücksichtigt.

Die geocentrischen Coordinaten sind nach den Bessel'schen Erddimensionen berechnet.

Die Columne »Correction der Sternzeit« enthält für jeden Ort die Differenz: Sternzeit im mittleren Mittag minus Sternzeit im mittleren Berliner Mittag.

Das Verzeichniſs hat im vorliegenden Jahrgang Aenderungen bezw. Zusätze für die Lage folgender Sternwarten erfahren:

Altenburg . . .	nach der *Centralzeitung für Optik und Mechanik* 1899 Nr. 13.
Bamberg . . .	nach den *Astronomischen Nachrichten* Nr. 3549.
Catania	nach brieflicher Mittheilung.
Dublin	nach brieflicher Mittheilung.
Heidelberg (Königst.)	nach den *Astronomischen Nachrichten* Nr. 3537, 3564.
Mare Island . .	nach den *Publications of the Astronimical Society of the Pacific* 1899 Vol. XI Nr. 68.
Perth	nach brieflicher Mittheilung.

18) Bahnelemente der kleinen Planeten.

Die Seiten 384—407 enthalten die Bahnelemente der kleinen Planeten nach den neuesten der Redaction bekannt gewordenen Bestimmungen. Die unmittelbar den Namen folgenden Columnen geben auch das Datum der Opposition im Jahre 1900 und die Gröſse zur Zeit derselben.

Ferner sind gegeben zwei Columnen m_0 und g, welche zur Berechnung der Gröfse dienen. Es bedeutet m_0 die mittlere Gröfse, d. h. diejenige Gröfse, welche der Planet in seiner mittleren Entfernung a von der Sonne und der gleichzeitigen Entfernung $a-1$ von der Erde haben würde; ferner ist g eine Gröfse, welche aus m_0 nach der Formel

$$g = m_0 - 5 \cdot \log a\,(a-1)$$

berechnet ist, und welche dazu dient, für einen beliebigen geocentrischen Ort des Planeten seine Gröfsenklasse M zu berechnen. Ist Δ die Entfernung des Planeten von der Erde, r seine Entfernung von der Sonne, so ist seine Gröfse

$$M = g + 5\,(\log \Delta + \log r).$$

19) Oppositions-Daten der kleinen Planeten.

Von den 366 im Jahre 1900 und zu Anfang des Jahres 1901 stattfindenden Oppositionen der kleinen Planeten (1)—(440) ist Seite 408—416 eine übersichtliche Zusammenstellung, nach der Oppositionszeit geordnet, gegeben. In diesem Verzeichnisse ist neben dem Namen des Planeten der Tag der Opposition in AR., die Gröfse, der genäherte geocentrische Ort, die tägliche Bewegung an jenem Tage, der Logarithmus der Entfernung des Planeten von der Erde und aufserdem das Jahr, in welchem der Planet zum letzten Male beobachtet wurde, angegeben.

Für 36 Planeten, welche in dem Oppositions-Verzeichnifs durch ein Sternchen (*) bezeichnet sind, enthalten die Seiten 417—455 ausführliche Ephemeriden; für etwa 110 weitere Planeten, deren Beobachtung im Jahre 1900 erwünscht erscheint, sind genäherte Oppositions-Ephemeriden in den Veröffentlichungen des Rechen-Institutes Nr. 11 und 12 gegeben.

20) Ausführliche Oppositions-Ephemeriden.

Diese Ephemeriden (Seite 417—455), die neben der Erleichterung der Beobachtungen einer künftigen Theorie der entsprechenden Planeten zur Grundlage dienen sollen, sind zum Theil im Rechen-Institut berechnet, zum Theil von den unterzeichneten Herren der Redaction gütigst zur Verfügung gestellt worden. Für die Lichtzeit ist hierbei angenommen: $498^s.4$.

Zu der über fünf Monate ausgedehnten Ephemeride des Eros, welche Herr Prof. Millosevich freundlichst zur Verfügung gestellt hat, ist zu bemerken, dafs die Gröfsenangaben ohne Rücksicht auf die Phase zu verstehen sind.

21) Nachweisungen über die kleinen Planeten.

Das die Nachweisungen über die kleinen Planeten enthaltende Verzeichniſs (Seite 456—478) giebt, in zwei Abschnitten, eine Uebersicht der Stellen in den verbreitetsten Publicationsmitteln, wo A. Beobachtungen, B. Berechnungen in Bezug auf die kleinen Planeten sich vorfinden. Das Nähere ist aus dem Verzeichnisse selbst unmittelbar zu ersehen. — Die Uebersicht umfaſst Band 147, S. 289 bis Band 150, S. 344 incl. der *Astronomischen Nachrichten* (bezeichnet mit A. N.), die *Comptes Rendus des Séances de l'Académie des Sciences* Band 127, S. 457 bis Band 129, S. 510 (bezeichnet mit C. R.), das *Bulletin Astronomique* XV, S. 369 bis XVI, S. 368 (bezeichnet mit B. A.), das *Astronomical Journal* Band 19, S. 97 bis Band 20, S. 106 (bezeichnet mit A. J.) und die *Monthly Notices* der R. A. S. Band LIX (bezeichnet mit M. N.). Die angenommenen Grenzen dieser Uebersicht entsprechen den Zeitgrenzen der Publication 1898 Oct. 1 bis 1899 Oct. 1.

Zur Statistik der kleinen Planeten im Jahre 1899.

Seit dem Erscheinen des letzten Jahrbuches sind bis Ende December 1899 folgende 14 neue Planeten entdeckt, bezw. als solche erkannt worden, welche zu der Gruppe zwischen Erde und Jupiter gehören:

437	1898 *DP*	entdeckt	1898	Juli	16		von Hrn. A. Charlois in Nizza.
438	» *DU*	»	»	Nov.	8		
439	Ohio	»	»	Oct.	13	» »	Coddington, Mt. Hamilton.
441	1898 *ED*	»	»	Dec.	8	» »	A. Charlois in Nizza.
442	1899 *EE*	»	1899	Febr.	15	» »	Wolf und Schwassmann in Heidelberg.
443	» *EF*	»	»	Febr.	17		
444	» *EL*	»	»	März	31	» »	Coggia in Marseille.
	» *EX*	»	»	Oct.	2	» »	Coddington, Mt. Hamilton.
	» *ER*	»	»	Oct.	27	» »	Wolf und Schwassmann in Heidelberg.
	» *ES*	»	»	Oct.	27		
	» *ET*	»	»	Oct.	27		
	» *EU*	»	»	Oct.	31		
	» *EV*	»	»	Oct.	10		
	» *EY*	»	»	Dec.	4	» »	A. Charlois in Nizza.

Auſser den oben genannten ist noch der Planet (1899 *EO*), über dessen Bahn wegen unzureichenden Beobachtungsmaterials indessen nichts ermittelt werden konnte, gefunden; die Nummer (440) hat der bereits im letzten Jahrgang aufgeführte Planet (1898 *EC*) erhalten.

Unter den 451 jetzt bekannten kleinen Planeten sind im gegenwärtigen Zeitpunkte (Ende December 1899), soviel der Redaction bekannt geworden ist:

301 Planeten, welche in mindestens 4 Oppositionen beobachtet sind, nämlich die Planeten (1) bis (270) mit Ausnahme von (99), (132), (149), (155), (156), (157), (163), (188), (193), (217), (220), (228), (255), (260) und (265) und aufserdem:

(273) Atropos	(295) Theresia	(329) Svea	(375)
(275) Sapientia	(301) Bavaria	(334) Chicago	(376)
(276) Adelheid	(303) Josephina	(335) Roberta	(377)
(277) Elvira	(304) Olga	(336) Lacadiera	(379)
(278) Paulina	(306) Unitas	(345) Tercidina	(384) Burdigala
(279) Thule	(308) Polyxo	(346) Hermentaria	(385) Ilmatar
(282) Clorinde	(313) Chaldaea	(347) Pariana	(386)
(283) Emma	(317) Roxane	(349) Dembowska	(387)
(284) Amalia	(318) Magdalena	(354) Eleonora	(389)
(287) Nephthys	(321) Florentina	(358)	(405)
(288) Glauke	(324) Bamberga	(363)	
(292) Ludovica	(326) Tamara	(371)	

37 Planeten, welche in 3 Oppositionen beobachtet sind, nämlich:

(149) Medusa	17	(286) Iclea	9	(344) Desiderata	6	(402)	4
(163) Erigone	18	(291) Alice	7	(348) May	6	(403)	4
(217) Eudora	16	(298) Baptistina	7	(352) Gisela	5	(409)	4
(228) Agathe	12	(305) Gordonia	8	(356)	6	(412) Elisabetha	4
(255) Oppavia	11	(311) Claudia	7	(362)	6	(416) Vaticana	3
(260) Huberta	12	(312) Pierretta	7	(366)	6	(419)	3
(265) Anna	10	(325) Heidelberga	7	(372)	6	(433)	3
(271) Penthesilea	10	(331) Etheridgea	7	(378)	5		
(272) Antonia	10	(337) Devosa	6	(380)	5		
(274) Philagoria	10	(343) Ostara	6	(381)	5		

35 Planeten, welche nur in 2 Oppositionen beobachtet sind, nämlich:

(188) Menippe	17	(307) Nike	8	(351) Yrsa	6	(391) Ingeborg	5
(280) Philia	9	(322) Phaeo	7	(364)	5	(397)	4
(281) Lucretia	8	(332) Siri	7	(365)	6	(404)	4
(289) Nenetta	8	(333) Badenia	6	(367)	5	(407)	4
(294) Felicia	8	(338) Budrosa	6	(369) Aëria	6	(415)	4
(297) Caecilia	8	(339) Dorothea	6	(370)	5	(420) Bertholda	3
(299) Thora	7	(340) Eduarda	6	(373)	6	(423)	3
(300) Geraldina	8	(342) Endymion	6	(374)	5	(424)	3
(302) Clarissa	7	(350)	6	(390)	5		

78 Planeten, welche bisher nur in 1 Opposition beobachtet sind, nämlich:

(99) Dike	25	(319) Leona	7	(388)	5	(417)	3
(132) Aethra	21	(320) Katharina	7	(392) Wilhelmina	5	(418)	3
(155) Scylla	20	(323) Brucia	6	(393)	5	(421) Zähringia	3
(156) Xanthippe	20	(327) Columbia	7	(394)	5	(422) Berolina	3
(157) Dejanira	19	(328) Gudrun	7	(395)	5	(425)	3
(193) Ambrosia	16	(330) Adalberta	6	(396)	5	(426)	2
(220) Stephania	14	(341) California	6	(398)	4	(427)	2
(285) Regina	9	(353)	6	(399)	4	(428)	2
(290) Bruna	8	(355)	6	(400)	5	(429)	2
(293) Brasilia	8	(357)	6	(401) Ottilia	5	(430)	2
(296) Phaëtusa	7	(359)	6	(406)	4	(431)	2
(309) Fraternitas	7	(360)	6	(408)	4	(432)	2
(310) Margarita	7	(361)	7	(410)	4	(436)	2
(314) Rosalia	7	(368)	6	(411)	4		
(315) Constantia	6	(382)	5	(413) Edburga	4		
(316) Goberta	7	(383)	5	(414)	4		

und aufserdem die Planeten (434), (435), (437) bis (444), (1899 *EX*), (1899 *ER*), (1899 *ES*), (1899 *ET*), (1899 *EU*), (1899 *EV*) und (1899 *EY*), deren zweite auf die Entdeckungs-Erscheinung folgende Opposition noch bevorsteht.

In den vorstehenden Angaben bezeichnen die hinter den Planetennamen befindlichen Ziffern die Anzahl der bisher, mit Einschlufs der Entdeckungs-Erscheinung, stattgefundenen Oppositionen.

Anhang I.

Vorläufige Verbesserungen der Oerter des Fixstern-Verzeichnisses im Jahrbuch S. 149 ff. für 1902,0.

Nachstehende vorläufige Verbesserungen der Oerter der 622 Sterne des Fundamental-Kataloges innerhalb seines Systemes sind der Redaction des Jahrbuchs von Herrn A. Auwers zur Verfügung gestellt worden und werden bis zur Fertigstellung des definitiven Fundamental-Kataloges für jedes Jahr an dieser Stelle mitgetheilt werden. Die aufgeführten Werthe schliefsen sich an die A. N. 3508/09 von Herrn Auwers mitgetheilten an, aufser für Sirius und Procyon, für welche hier sogleich die Reduction auf den hellen Stern mit der fortschreitenden Verbesserung zusammen in einer Zahl gegeben wird. Dabei sind an Stelle der oben p. 154, 155 aufgeführten Uebertragungen Werthe angewandt, welche für Sirius nach A. N. 3085 (El. V*), für Procyon nach vorläufigen neuen elliptischen Elementen (B. Berl. Ak. 1898) angenommen wurden.

Name	Nr. des Fund.-Kat.	1902.0 Δα	1902.0 Δδ	Name	Nr. des Fund.-Kat.	1902.0 Δα	1902.0 Δδ
		s	″			s	″
α Andromed.	1	+0.002	−0.21	ϑ Ceti	21	−0.013	−0.33
β Cassiopejae	2	+0.005	−0.07	δ Cassiopejae	20	−0.031	−1.20
22 Andromed.	337	−0.078	+0.56	α Ursae min.	19	+0.072	−0.03
γ Pegasi	3	−0.013	+0.11	η Piscium	22	+0.019	+0.14
Br. 6	338	+0.790	+0.22	40 Cassiopejae	347	+0.064	−0.19
ι Ceti	4	+0.019	+0.20	υ Persei	23	+0.001	−0.36
12 Ceti	339	−0.029	+0.07	43 Cassiopejae	348	+0.006	−0.14
κ Cassiopejae	5	−0.051	+0.45	ν Piscium	349	+0.021	−0.12
ζ Cassiopejae	6	−0.021	−0.10	φ Persei	24	+0.020	+0.17
π Andromed.	7	+0.029	+0.02	τ Ceti	542	+0.036	+0.07
ε Andromed.	8	−0.012	+0.06	ο Piscium	25	+0.024	+0.06
δ Andromed.	9	−0.045	−0.39	Lac. ε Sculpt.	543	+0.028	+0.26
α Cassiopejae	10	+0.069	−0.07	ζ Ceti	544	+0.012	−0.16
β Ceti	540	−0.026	+0.37	ε Cassiopejae	26	+0.015	−0.15
21 Cassiopejae	340	+0.039	−0.03	α Trianguli	27	−0.036	−0.12
ο Cassiopejae	341	+0.048	+0.01	γ Arietis	28	+0.026	−0.34
ζ Andromed.	11	+0.024	−0.16	ξ Piscium	29	−0.017	+0.15
η Cassiopejae	12	+0.446	−1.86	β Arietis	30	+0.013	+0.02
δ Piscium	342	+0.005	+0.21	50 Cassiopejae	31	−0.014	−0.12
Br. 82	343	+0.227	+0.17	υ Ceti	545	+0.024	+0.47
γ Cassiopejae	13	+0.043	+0.09	γ Andromed.	32	+0.028	+0.08
μ Andromed.	14	−0.127	−0.26	α Arietis	33	−0.010	−0.29
43 H. Cephei	344	+0.175	−0.32	β Trianguli	34	−0.040	−0.04
ε Piscium	15	−0.010	−0.32	55 Cassiopejae	350	−0.007	+0.09
η Ceti	541	−0.021	+0.04	6 Persei	351	+0.004	−0.17
44 H. Cephei	345	+0.001	+0.53	Lac. μ Forn.	546	+0.053	+0.31
β Andromed.	16	−0.034	−0.55	γ Trianguli	352	−0.002	−0.06
τ Piscium	17	−0.020	−0.96	67 Ceti	353	+0.009	−0.21
υ Piscium	18	+0.016	−0.28	ϑ Arietis	354	+0.011	0.00
ψ Cassiopejae	346	−0.008	+0.68	ο Ceti	35	+0.022	+0.57

Name	Nr. des Fund.-Kat.	1902.0 Δα	Δδ	Name	Nr. des Fund.-Kat.	1902.0 Δα	Δδ
ι Cassiopejae	36	+0.041	+0.14	τ⁶ Eridani	551	+0.005	+0.95
ξ² Ceti	37	+0.001	−0.07	27 Tauri	62	+0.010	+0.42
36 H. Cassiop.	38	−0.176	−0.25	ζ Persei	63	0.000	−0.09
ν Arietis	355	+0.001	−0.29	9 H. Camelop.	365	−0.017	−1.12
δ Ceti	39	−0.046	+0.63	ε Persei	64	+0.026	−0.28
Br. 366	356	−0.023	+0.01	ξ Persei	65	+0.012	+0.41
ϑ Persei	40	0.000	+0.13	γ Eridani	552	−0.003	+0.10
35 Arietis	357	+0.021	+0.19	λ Tauri	66	−0.014	+0.11
γ Ceti	41	+0.009	+0.51	ν Tauri	67	−0.039	+0.31
π Ceti	547	+0.008	−0.04	c Persei	69	+0.044	−0.04
μ Ceti	42	+0.048	−0.03	Gr. 750	68	+0.215	+0.46
η Persei	43	−0.032	+0.73	o¹ Eridani	366	−0.024	−0.08
41 Arietis	44	+0.021	+0.44	54 Persei	367	+0.022	+0.14
τ² Eridani	548	−0.003	+0.43	γ Tauri	70	−0.013	+0.49
τ Persei	45	+0.007	−0.04	δ Tauri	71	−0.006	+0.02
η Eridani	46	−0.014	−0.23	ε Tauri	72	−0.002	+0.07
47 H. Cephei	358	−0.158	−0.45	1 Camel. seq.	368	−0.121	−0.29
α Ceti	47	+0.021	−0.01	α Tauri	73	+0.012	+0.10
γ Persei	48	+0.008	−0.26	ν Eridani	74	+0.040	−0.53
ρ Persei	49	−0.004	−0.13	53 Eridani	553	+0.055	+0.31
β Persei	50	+0.039	−0.37	Gr. 848	369	−0.089	−0.46
ι Persei	51	+0.014	−0.60	τ Tauri	370	+0.020	−0.36
δ Arietis	359	+0.003	+0.28	4 Camelop.	371	+0.073	+0.08
48 H. Cephei	360	+0.333	−0.33	μ Eridani	75	+0.014	−0.29
12 Eridani	549	−0.074	−0.92	9 Camelop.	76	+0.033	+0.01
α Persei	52	−0.013	+0.08	π⁴ Orionis	77	−0.006	+0.23
o Tauri	53	−0.023	−0.06	π⁵ Orionis	78	−0.047	+0.34
2 H. Camelop.	361	+0.004	−0.54	ι Aurigae	79	−0.021	−0.44
ξ Tauri	54	−0.036	+0.64	10 Camelop.	80	−0.068	−0.05
σ Persei	362	−0.003	−0.20	ε Aurigae	81	+0.030	−0.05
f Tauri	55	+0.002	−0.25	ζ Aurigae	82	−0.020	−0.55
ε Eridani	56	+0.008	+0.61	ι Tauri	372	+0.004	−0.04
Gr. 716	363	−0.036	−1.44	η Aurigae	83	−0.021	−0.31
δ Persei	57	+0.024	−0.19	ε Leporis	554	+0.019	+0.08
o Persei	58	+0.052	−0.12	β Eridani	84	−0.026	−0.56
γ Persei	59	−0.029	+0.28	λ Eridani	85	−0.030	−0.49
δ Eridani	550	−0.019	+0.92	19 H. Camelop.	373	+0.098	+0.07
17 Tauri	60	+0.015	−0.02	μ Aurigae	374	+0.050	+0.09
5 H. Camelop.	364	+0.235	+0.01	α Aurigae	86	−0.024	−0.04
η Tauri	61	+0.018	−0.24	β Orionis	87	+0.003	+0.13

Name	Nr. des Fund.-Kat.	1902.0		Name	Nr. des Fund.-Kat.	1902.0	
		Δα	Δδ			Δα	Δδ
τ Orionis	88	+0.043	+0.10	23 H. Camelop.	387	−0.131	+1.10
η Orionis med.	89	+0.033	−0.08	ξ² Canis maj.	563	−0.032	−0.76
γ Orionis	91	+0.024	−0.04	51 Aurigae	389	+0.020	−0.07
β Tauri	90	+0.008	+0.28	γ Geminorum	107	−0.012	+0.08
17 Camelop.	375	−0.008	−0.13	*S* Monocerotis	108	−0.021	+0.20
β Leporis	555	+0.002	−0.43	ε Geminorum	109	+0.030	−0.07
Gr. 966	92	−0.175	+1.08	ψ⁵ Aurigae	390	+0.113	+0.18
δ Orionis	93	+0.001	+0.37	ξ Geminorum	110	+0.005	+0.27
α Leporis	556	+0.012	−0.14	α Canis maj.	564	−0.158*	+0.92*
φ¹ Orionis	376	+0.019	+0.23	18 Monocerotis	392	−0.006	+0.36
ϑ¹ Orionis	94	+0.068	−0.42	43 Camelop.	391	+0.007	−1.61
ϑ² Orionis	95	−0.028	+0.14	24 H. Camelop.	393	−0.085	−0.09
ι Orionis	96	−0.019	−0.01	ϑ Geminorum	112	−0.027	−0.16
ε Orionis	97	+0.023	−0.28	15 Lyncis	394	−0.020	−0.35
ζ Tauri	98	−0.005	+0.14	ϑ Canis maj.	565	−0.001	+0.08
σ Orionis	99	+0.011	+0.37	51 H. Cephei	111	−0.574	+0.13
ο Aurigae	377	+0.058	+0.80	ε Canis maj.	566	+0.001	−0.45
γ Leporis	557	+0.065	−0.39	ζ Geminorum	113	−0.007	+0.15
130 Tauri	378	+0.046	−0.66	γ Canis maj.	567	+0.051	+0.23
ζ Leporis	558	−0.014	−0.24	δ Canis maj.	568	−0.003	−0.12
κ Orionis	100	+0.032	−0.17	63 Aurigae	395	−0.016	−0.47
ν Aurigae	101	+0.105	−0.39	64 Aurigae	396	−0.124	−0.40
δ Leporis	559	−0.024	+0.88	λ Geminorum	114	−0.010	−0.23
α Orionis	102	0.000	−0.18	δ Geminorum	115	+0.017	−0.17
δ Aurigae	379	+0.044	−0.19	19 Lyncis seq.	397	+0.086	−0.22
η Leporis	560	+0.023	−0.34	ι Geminorum	117	+0.005	+0.06
β Aurigae	103	+0.017	+0.15	Gr. 1308	116	−0.214	+0.88
ϑ Aurigae	104	−0.023	−0.11	β Canis min.	118	−0.010	−0.03
66 Orionis	380	−0.036	+0.15	ρ Geminorum	398	+0.055	−0.14
ν Orionis	382	−0.003	−0.19	α Geminorum	119	+0.053	+0.52
36 Camelop.	381	+0.228	+0.31	25 Monocerotis	569	+0.125	−0.12
22 H. Camelop.	383	+0.052	−0.05	α Canis min.	120	+0.011*	−0.41*
η Geminorum	105	−0.010	+0.01	24 Lyncis	399	−0.071	+0.13
2 Lyncis	384	−0.073	−0.55	κ Geminorum	121	+0.012	+0.35
μ Geminorum	106	−0.001	−0.23	β Geminorum	122	−0.002	+0.11
ψ¹ Aurigae	385	−0.008	+0.25	π Geminorum	400	−0.018	−0.49
β Canis maj.	561	−0.008	−0.08	26 Lyncis	402	+0.017	+0.69
8 Monocerotis	386	−0.065	+0.21	Gr. 1374	401	+0.146	−0.25
10 Monocerotis	562	+0.005	+0.48	53 Camelop.	403	−0.157	+0.17
8 Lyncis	388	+0.060	−0.78	χ Geminorum	404	+0.011	+0.01

* S. Vorbemerkung. — Die Correctionen der S. 230, 235 gegebenen Ephemeriden werden, für die Mitte des Jahres, −0ˢ.030 +0″.11, bezw. −0ˢ.021 +0″.44.

Name	Nr. des Fund.-Kat.	1902.0 Δα	1902.0 Δδ	Name	Nr. des Fund.-Kat.	1902.0 Δα	1902.0 Δδ
		s	″			s	″
27 Lyncis	405	+0.135	—0.18	μ Leonis	144	+0.035	+0.23
ι Navis	570	+0.009	—0.20	Gr. 1586	421	+0.062	—0.40
Br. 1147	406	—0.022	+0.08	19 Leonis min.	422	+0.012	—0.42
20 Navis	571	—0.006	+0.87	π Leonis	423	+0.017	+0.17
β Cancri	123	+0.004	+0.08	η Leonis	145	—0.111	+0.38
31 Lyncis	407	—0.091	+0.16	α Leonis	146	+0.022	—0.11
Br. 1197	124	+0.027	—0.48	λ Hydrae	573	—0.006	—0.18
o Ursae maj.	125	+0.024	—0.03	λ Ursae maj.	147	+0.011	+0.65
Gr. 1450	408	+0.131	+1.64	ζ Leonis	148	+0.017	—0.33
η Cancri	409	+0.004	+0.26	μ Ursae maj.	149	—0.007	+0.09
Gr. 1446	410	—0.073	—0.31	30 H. Urs. maj.	424	+0.091	—0.47
Gr. 1460	411	+0.216	—0.11	30 H. Camelop.	425	+0.077	—0.24
δ Cancri	126	+0.021	+0.11	μ Hydrae	574	—0.011	—0.22
ι Cancri	127	—0.020	—0.30	31 Leonis min.	426	+0.012	—0.40
ε Hydrae	128	—0.016	—0.51	Lac. α Antliae	575	+0.019	+0.84
σ² Cancri med.	412	—0.010	+0.45	36 Ursae maj.	427	+0.038	—0.03
ζ Hydrae	129	—0.033	+0.07	9 H. Draconis	150	+0.210	+0.01
ι Ursae maj.	130	—0.034	+0.13	ρ Leonis	151	—0.016	—0.03
α Cancri	131	+0.018	+0.10	37 Ursae maj.	428	+0.078	—0.22
ρ Ursae maj.	413	—0.107	—0.20	35 H. Urs. maj.	429	—0.179	+0.50
10 Ursae maj.	132	+0.019	+0.25	33 Sextantis	576	+0.106	—0.49
Gr. 1501	414	—0.159	—0.70	41 Leonis min.	430	+0.044	+0.03
κ Ursae maj.	133	—0.026	+0.43	42 Leonis min.	431	+0.056	—0.47
σ² Ursae maj.	415	—0.107	—0.31	*l* Leonis	432	—0.004	+0.29
36 Lyncis	416	—0.182	—0.14	ν Hydrae	577	—0.002	—0.14
ϑ Hydrae	134	—0.014	+0.37	46 Leonis min.	152	+0.048	—0.66
38 Lyncis	135	0.000	+0.02	Br. 1508	433	—0.105	—0.09
83 Cancri	417	—0.009	+0.88	β Ursae maj.	153	+0.018	—0.40
40 Lyncis	136	+0.043	+0.16	α Ursae maj.	154	—0.018	—0.20
α Hydrae	138	—0.014	—0.48	χ Leonis	434	+0.037	—0.23
1 H. Draconis	137	+0.312	—0.12	ψ Ursae maj.	155	—0.007	+0.31
h Ursae maj.	139	+0.068	—0.04	β Crateris	578	+0.021	+0.08
d Ursae maj.	418	—0.074	—0.11	δ Leonis	156	—0.018	—0.20
ϑ Ursae maj.	140	+0.005	+0.75	ϑ Leonis	157	+0.019	—0.34
10 Leonis min.	419	—0.029	—0.04	Gr. 1757	435	—0.056	—0.40
Gr. 1564	420	+0.008	—0.07	ξ Urs. maj. m.	158	+0.064	+0.18
o Leonis	141	—0.018	—0.04	ν Ursae maj.	159	—0.158	—0.45
ε Leonis	142	+0.002	+0.08	δ Crateris	579	+0.020	+0.24
υ Ursae maj.	143	—0.026	—0.38	σ Leonis	160	—0.017	+0.10
6 Sextantis	572	—0.045	—0.05	Gr. 1771	436	+0.407	+0.32

Name	Nr. des Fund.-Kat.	1902.0		Name	Nr. des Fund.-Kat.	1902.0	
		Δα	Δδ			Δα	Δδ
		s	″			s	″
ι Leonis	161	+0.053	−0.27	α Virginis	587	+0.007	−0.07
γ Crateris	580	+0.029	−0.56	Gr. 2001	452	+0.088	−0.15
58 Ursae maj.	437	+0.034	+0.25	69 H. Urs. maj.	453	−0.083	+0.73
λ Draconis	162	−0.092	−0.02	ζ Virginis	179	+0.003	−0.35
ξ Hydrae	581	−0.029	−0.54	17 H. Can. ven.	454	+0.047	+0.26
υ Leonis	438	+0.010	−0.02	Gr. 2029	455	−0.008	−0.52
3 Draconis	439	−0.117	0.00	τ Bootis	180	−0.027	+0.08
χ Ursae maj.	163	−0.015	−0.13	η Ursae maj.	181	−0.055	−0.08
β Leonis	164	+0.008	−0.07	89 Virginis	588	+0.018	+0.53
β Virginis	165	+0.009	+0.09	*i* Draconis	456	+0.035	+0.23
γ Ursae maj.	166	+0.016	0.00	η Bootis	182	−0.029	−0.20
ο Virginis	167	−0.014	+0.13	τ Virginis	183	+0.012	+0.80
Gr. 1852	440	−0.047	+0.32	11 Bootis	457	+0.004	−0.08
ε Corvi	582	−0.011	+0.06	α Draconis	184	+0.002	−0.21
4 H. Draconis	168	−0.036	−0.40	*d* Bootis	458	−0.013	+0.73
δ Ursae maj.	169	−0.035	+0.24	κ Virginis	185	−0.032	+0.12
γ Corvi	583	−0.019	−0.38	4 Ursae min.	459	+0.073	−0.43
2 Canum ven.	441	−0.019	−0.41	ι Virginis	186	+0.018	+0.04
η Virginis	170.	−0.001	+0.53	α Bootis	187	+0.005	−0.28
6 Canum ven.	442	−0.147	+0.54	λ Bootis	188	+0.040	+0.11
δ Corvi	584	−0.076	+0.59	ι Bootis	189	+0.010	+0.01
20 Comae	443	−0.107	−0.37	ϑ Bootis	190	+0.034	−0.02
74 Ursae maj.	444	−0.151	−0.30	φ Virginis	191	−0.008	+0.10
8 Canum ven.	445	+0.033	+0.20	ρ Bootis	192	−0.007	+0.07
β Corvi	585	+0.061	+0.19	γ Bootis	193	+0.007	+0.19
κ Draconis	171	+0.109	+0.30	Gr. 2125	460	+0.062	+1.42
24 Comae seq.	446	−0.022	+0.04	33 Bootis	461	+0.001	+1.65
γ Virgin. med.	172	−0.038	+0.17	π Bootis pr.	194	+0.062	+1.60
76 Ursae maj.	447	−0.023	+0.02	ζ Bootis med.	195	+0.037	−0.05
ε Ursae maj.	173	+0.055	+0.95	μ Virginis	196	−0.006	−0.12
δ Virginis	174	+0.030	−0.25	109 Virginis	197	+0.018	−0.05
12 Can. ven. sq.	175	+0.014	−0.24	8 Librae	589	+0.040	+0.91
8 Draconis	448	−0.136	+0.39	α Librae	590	+0.008	+0.27
ε Virginis	176	−0.023	+0.13	Gr. 2164	462	−0.002	−1.10
ϑ Virginis	449	+0.020	−0.09	β Ursae min.	198	−0.018	+0.14
17 Canum ven.	450	+0.043	+0.03	P. XIV. 221	463	−0.050	−0.65
43 Comae	177	−0.027	−0.13	2 H. Urs. min.	464	−0.268	−1.13
20 Canum ven.	451	+0.038	−0.20	β Bootis	199	−0.007	−0.15
γ Hydrae	586	+0.098	−0.33	γ Scorpii	591	+0.002	−0.67
ζ Urs. maj. pr.	178	+0.038	−0.01	ψ Bootis	465	+0.017	+0.26

Name	Nr. des Fund.-Kat.	1902.0 Δα	Δδ
		s	″
ι Librae	592	—0.035	+0.30
3 Serpentis	466	—0.045	—0.03
δ Bootis	201	—0.023	—0.38
β Librae	200	—0.009	—0.05
1 H. Urs. min.	467	+0.094	—0.09
μ Bootis	202	+0.060	+0.36
γ Ursae min.	203	—0.297	—0.40
τ¹ Serpentis	468	+0.040	—0.79
ι Draconis	204	+0.055	—0.41
β Coron. bor.	205	—0.044	+0.47
ν¹ Bootis	206	—0.025	+0.44
ν² Bootis	207	+0.011	+0.53
ϑ Coron. bor.	208	+0.120	+0.41
γ Librae	593	—0.056	—0.22
α Coron. bor.	209	—0.018	+0.18
φ Bootis	469	—0.023	+0.47
ζ Cor. bor. (sq.)	210	+0.061	—0.15
γ Coron. bor.	211	—0.007	+0.48
α Serpentis	212	—0.003	+0.12
β Serpentis	213	+0.043	—0.37
κ Serpentis	215	—0.017	—0.31
μ Serpentis	214	+0.007	—0.61
12 H. Draconis	470	—0.109	+0.10
ε Serpentis	216	+0.019	+0.29
ζ Ursae min.	217	+0.125	—0.07
γ Serpentis	218	+0.019	+0.01
ε Coron. bor.	219	—0.005	+0.10
δ Scorpii	594	—0.025	—0.16
Gr. 2296	471	+0.166	+0.14
β Scorpii	595	+0.004	+0.29
ϑ Draconis	220	—0.150	—0.35
φ Herculis	221	+0.291	—0.25
δ Ophiuchi	222	+0.008	—0.25
ε Ophiuchi	223	—0.018	+0.43
19 Ursae min.	472	+0.163	+0.29
τ Herculis	224	+0.129	—0.15
γ Herculis	225	+0.025	+0.06
η Ursae min.	474	—0.068	—0.24
ω Herculis	473	+0.128	—0.81
Gr. 2343	475	—0.083	+0.44

Name	Nr. des Fund.-Kat.	1902.0 Δα	Δδ
		s	″
η Draconis	226	—0.373	+0.47
α Scorpii	596	—0.008	+0.22
λ Ophiuchi	227	—0.032	—0.11
β Herculis	228	+0.042	+0.29
A Draconis	229	+0.122	—0.22
σ Herculis	230	+0.026	+0.39
ζ Ophiuchi	597	—0.007	—0.08
Gr. 2373	476	—0.250	—0.26
ζ Herculis	231	+0.004*	—0.22*
η Herculis	232	—0.026	—0.23
Gr. 2377	477	—0.141	+0.23
49 Herculis	478	—0.033	+0.11
κ Ophiuchi	233	+0.009	—0.43
ε Ursae min.	235	—0.050	+0.08
ε Herculis	234	+0.002	+0.26
60 Herculis	479	—0.004	+0.04
Gr. 2415	480	+0.112	—0.39
η Ophiuchi	598	+0.013	+0.08
ζ Draconis	236	—0.043	—0.29
α Herculis	237	—0.002	+0.60
δ Herculis	238	+0.009	+0.03
π Herculis	239	+0.003	+0.34
ϑ Ophiuchi	599	+0.003	+0.73
x Herculis	481	+0.102	+0.54
β Draconis	240	—0.005	+0.02
ν¹ Draconis	242	—0.037	—0.04
ν² Draconis	243	0.000	+0.08
α Ophiuchi	241	—0.003	—0.22
ξ Serpentis	600	+0.009	—0.39
f Draconis	482	+0.121	+0.17
ι Herculis	244	—0.053	—0.16
ω Draconis	483	—0.058	+0.37
β Ophiuchi	245	+0.005	—0.27
μ Herculis	246	—0.052	+0.33
γ Ophiuchi	247	+0.034	—0.20
ψ Drac. (austr.)	484	+0.079	—0.17
ξ Draconis	248	—0.253	—0.01
ϑ Herculis	249	+0.066	—0.12
ν Ophiuchi	250	—0.008	—1.06
35 Draconis	485	—0.038	0.00

* Correction für den Hauptstern.

Name	Nr. des Fund.-Kat.	1902.0		Name	Nr. des Fund.-Kat.	1902.0	
		Δα	Δδ			Δα	Δδ
ξ Herculis	251	s −0.020	″ +0.24	β Cygni	275	s +0.013	″ +0.66
γ Draconis	252	+0.020	+0.20	ι Cygni	276	−0.033	+0.01
67 Ophiuchi	253	−0.126	−0.16	Gr. 2900	497	+0.381	−0.36
γ Sagittarii	601	−0.039	+0.65	*h* Sagittarii	605	+0.054	−0.27
72 Ophiuchi	254	+0.017	−0.09	ϑ Cygni	498	−0.017	−0.12
o Herculis	255	−0.007	+0.25	15 Cygni	499	−0.051	+0.05
δ Ursae min.	256	−0.135	+0.25	γ Aquilae	277	+0.006	−0.03
μ Sagittarii	602	−0.015	+0.25	δ Cygni	278	−0.035	+0.04
Gr. 2533	486	+0.198	−0.58	δ Sagittae	279	+0.032	−0.72
36 Draconis	487	+0.057	+0.27	α Aquilae	280	−0.007	+0.21
η Serpentis	257	+0.033	−0.57	η Aquilae	281	+0.046	−0.09
109 Herculis	258	−0.008	+0.23	ε Draconis	282	+0.098	−0.02
φ Draconis	489	−0.121	−0.14	β Aquilae	283	+0.018	−0.02
b Draconis	488	+0.057	+0.35	ψ Cygni	285	+0.016	+0.36
χ Draconis	259	+0.071	−0.26	γ Sagittae	286	+0.006	−0.31
α Lyrae	260	−0.034	−0.46	ϑ Aquilae	287	+0.029	+0.02
Gr. 2655	490	−0.252	+0.58	o^1 seq. Cygni	288	−0.006	−0.14
Gr. 2640	491	+0.115	+1.10	33 Cygni	500	−0.120	+0.85
ε Lyrae a. pr.	261	+0.086	−0.61	ϰ Cephei	502	+0.141	+0.25
5 Lyrae med.	262	+0.031	−0.24	α^1 Capricorni	606	+0.024	−0.48
110 Herculis	263	+0.027	+0.60	24 Vulpeculae	501	−0.001	+0.77
β Lyrae	264	+0.005	−0.47	α^2 Capricorni	607	+0.019	−0.16
σ Sagittarii	603	−0.026	−0.12	β Capricorni	608	−0.007	−0.13
o Draconis	265	+0.023	−0.33	γ Cygni	289	−0.048	−0.54
ϑ Serpent. pr.	266	+0.008	−0.84	ρ Capricorni	609	−0.015	−0.03
R Lyrae	492	+0.006	+0.23	ϑ Cephei	291	+0.022	+0.31
ε Aquilae	267	−0.025	+0.45	ε Delphini	290	+0.003	+0.09
γ Lyrae	268	+0.031	−0.14	73 Draconis	504	−0.013	0.00
υ Draconis	493	−0.012	+0.18	β Delphini	292	+0.028	−0.02
ζ Aquilae	270	+0.024	−0.01	ϰ Delphini	503	−0.002	+0.25
λ Aquilae	269	+0.025	+0.04	υ Capricorni	610	−0.001	−0.97
ι Lyrae	494	−0.050	−0.31	α Delphini	293	+0.006	+0.05
π Sagittarii	604	−0.010	+0.23	α Cygni	294	−0.017	−0.22
δ Draconis	271	+0.006	−0.08	δ Delphini	295	−0.005	−0.14
ϑ Lyrae	496	+0.110	+0.44	γ Delphini sq.	296	−0.002	+0.07
ω Aquilae	495	−0.012	−0.12	ε Cygni	298	−0.017	−0.06
ϰ Cygni	272	−0.004	+0.03	ε Aquarii	297	−0.002	+0.11
τ Draconis	273	−0.045	−0.27	6 H. Cephei	505	+0.081	+0.24
λ Ursae min.	284	−0.112	+0.49	η Cephei	299	+0.027	−0.05
δ Aquilae	274	−0.004	+0.12	λ Cygni	506	+0.023	−0.52

Name	Nr. des Fund.-Kat.	1902.0		Name	Nr. des Fund.-Kat.	1902.0	
		Δα	Δδ			Δα	Δδ
76 Draconis	508	+0.011	+0.33	3 Lacertae	524	+0.028	+0.14
32 Vulpeculae	507	−0.022	+0.22	δ Cephei	318	−0.015	−0.29
Br. 2749	509	−0.175	−0.09	7 Lacertae	319	+0.026	+0.23
ν Cygni	300	−0.008	−0.72	η Aquarii	320	+0.013	−0.01
ξ Cygni	301	−0.039	0.00	31 Cephei	525	−0.166	−0.56
61 Cygni pr.	302	+0.193	+0.31	10 Lacertae	526	−0.015	−0.26
ν Aquarii	611	+0.016	+0.08	30 Cephei	527	+0.058	+0.39
Br. 2777	510	+0.020	−0.05	ζ Pegasi	321	−0.018	+0.41
ζ Cygni	303	+0.023	+0.40	η Pegasi	322	−0.020	−0.30
Gr. 3415	511	−0.027	+0.34	13 Lacertae	528	+0.038	+0.24
τ Cygni	305	+0.005	−0.64	λ Pegasi	323	−0.009	−0.14
α Equulei	304	+0.020	−0.23	τ Aquarii	617	+0.014	+0.66
α Cephei	306	−0.024	+0.75	μ Pegasi	324	−0.002	+0.14
1 Pegasi	512	−0.032	−0.16	ι Cephei	325	+0.065	+0.22
ζ Capricorni	612	−0.020	+0.70	λ Aquarii	326	+0.020	+0.16
g Cygni	513	+0.038	+0.33	δ Aquarii	618	+0.006	−0.33
β Aquarii	307	−0.006	+0.13	α Piscis austr.	619	+0.014	−0.08
β Cephei	308	−0.037	+0.14	ο Andromed.	327	+0.014	−0.33
74 Cygni	514	−0.020	+0.45	β Pegasi	328	+0.003	+0.34
γ Capricorni	613	−0.014	−0.19	α Pegasi	329	+0.003	−0.28
13 H. Cephei	515	0.000	+0.18	c^2 Aquarii	620	−0.028	−0.69
ε Pegasi	309	−0.020	−0.24	π Cephei	529	−0.058	−0.02
ϰ Pegasi	310	+0.056	−0.07	Br. 3077	530	+0.063	+0.09
11 Cephei	516	+0.031	−0.04	γ Piscium	330	+0.015	−0.09
λ Capricorni	614	−0.034	+1.02	τ Pegasi	531	+0.003	+0.42
δ Capricorni	615	−0.025	+0.16	4 Cassiopejae	533	+0.014	+0.33
π^2 Cygni	517	−0.046	+0.17	υ Pegasi	532	+0.056	−0.14
16 Pegasi	518	−0.018	+0.07	ϰ Piscium	534	+0.022	+0.27
20 Pegasi	519	−0.037	+0.24	70 Pegasi	535	+0.033	+0.33
α Aquarii	311	+0.018	−0.19	72 Pegasi	536	+0.036	+0.09
ι Aquarii	616	+0.030	−0.19	λ Andromed.	331	−0.072	−0.07
20 Cephei	520	+0.040	−0.39	ι Andromed.	332	−0.023	+0.23
ι Pegasi	312	−0.002	+0.19	ι Piscium	333	+0.003	+0.20
27 Pegasi	313	−0.003	−0.20	γ Cephei	334	+0.016	+0.51
ϑ Pegasi	314	−0.013	−0.31	ϰ Andromed.	335	−0.029	−0.27
π Pegasi	315	−0.002	−0.63	ω^2 Aquarii	621	−0.009	−0.16
ζ Cephei	316	+0.070	−0.01	41 H. Cephei	537	+0.156	+0.04
24 Cephei	521	+0.096	−0.34	Lac. δ Sculpt.	622	+0.064	−0.53
ϑ Aquarii	522	−0.012	−0.13	φ Pegasi	538	+0.042	+0.73
γ Aquarii	317	+0.001	−0.25	ρ Cassiopejae	539	+0.065	+0.43
31 Pegasi	523	+0.010	−0.01	ω Piscium	336	+0.004	−0.09

Anhang II.

Verbesserung
der Ephemeride des Mondkraters Mösting A für
1901.

Die Ephemeride des Mondkraters Mösting A im Jahrbuch für 1901 ist vom 23. Juli ab mit einem fehlerhaften Werth von ☊′ berechnet und wird daher hier berichtigt wiedergegeben.

Krater im Meridian.

Datum	Physische Libration in selenoc.		Reduction für Meridianbeobachtungen							
			in AR.			in Decl.			Parallaxe	
	Länge	Breite	$\alpha_☾ - \alpha_k$	Diff.		$\delta_☾ - \delta_k$	Diff.		lg. sin p_k	Diff.
	′	′	s	s	s	″	″	″		
Juli 23	−0.9	−0.5	−3.98	+0.54		+111.2	−30.3		8.20020	+ 12
24	0.8	0.4	−3.44	0.64	+0.10	+ 80.9	30.0	+0.3	20032	153
25	0.8	0.4	−2.80	0.74	0.10	+ 50.9	28.2	1.8	20185	283
26	0.7	0.4	−2.06	0.83	+0.09	+ 22.7	24.8	3.4	20468	389
27	0.7	0.4	−1.23	0.81	−0.02	− 2.1	20.4	4.4	20857	463
28	0.7	0.4	−0.42	0.66	0.15	− 22.5	15.5	4.9	21320	500
29	0.7	0.4	+0.24	+0.37	0.29	− 38.0	10.7	4.8	21820	500
30	0.7	0.4	+0.61	−0.03	0.40	− 48.7	6.2	4.5	22320	463
31	0.7	0.4	+0.58	0.47	0.44	− 54.9	− 2.0	4.2	22783	397
Aug. 1	0.8	0.4	+0.11	0.90	0.43	− 56.9	+ 1.8	3.8	23180	313
2	0.9	0.4	−0.79	1.32	0.42	− 55.1	6.3	4.5	23493	232
3	1.0	0.4	−2.11	1.66	0.34	− 48.8	11.8	5.5	23725	123
4	1.1	0.4	−3.77	1.86	0.20	− 37.0	18.2	6.4	23848	+ 50
5	1.2	0.4	−5.63	1.87	−0.01	− 18.8	25.3	7.1	23898	− 22
6	1.3	0.4	−7.50	−1.63	+0.24	+ 6.5	+31.8	+6.5	23876	− 88
7	1.4	0.4	−9.13			+ 38.3			23788	

Krater im Meridian.

Datum	Physische Libration in selenoc.		Reduction für Meridianbeobachtungen							
			in AR.			in Decl.			Parallaxe	
	Länge	Breite	$\alpha_{☾} - \alpha_k$	Diff.		$\delta_{☾} - \delta_k$	Diff.		lg. sin p_k	Diff.
	′	′	s	s	s	″	″	″		
Aug. 22	−1.5	−0.3	− 2.17	+0.98		+ 28.8	−25.7		8.20197	+324
23	1.5	0.3	− 1.19	1.02	+0.04	+ 3.1	21.1	+4.6	20521	448
24	1.4	0.3	− 0.17	0.90	−0.12	− 18.0	15.9	5.2	20969	547
25	1.4	0.3	+ 0.73	0.60	0.30	− 33.9	10.6	5.3	21516	609
26	1.4	0.3	+ 1.33	+0.12	0.48	− 44.5	6.4	4.2	22125	616
27	1.4	0.3	+ 1.45	−0.44	0.56	− 50.9	− 2.9	3.5	22741	576
28	1.5	0.3	+ 1.01	1.02	0.58	− 53.8	0.0	2.9	23317	481
29	1.5	0.3	− 0.01	1.57	0.55	− 53.8	+ 3.5	3.5	23798	353
30	1.6	0.3	− 1.58	2.02	0.45	− 50.3	8.3	4.8	24151	193
31	1.7	0.3	− 3.60	2.29	−0.27	− 42.0	15.0	6.7	24344	+ 41
Sept. 1	1.8	0.3	− 5.89	2.29	0.00	− 27.0	23.1	8.1	24385	−104
2	1.9	0.3	− 8.18	1.98	+0.31	− 3.9	31.1	8.0	24281	219
3	2.0	0.3	−10.16	1.32	0.66	+ 27.2	37.2	6.1	24062	302
4	2.1	0.3	−11.48	−0.46	+0.86	+ 64.4	+39.0	+1.8	23760	−354
5	2.2	0.3	−11.94			+103.4			23406	
Sept. 21	−1.8	−0.2	+ 0.93	+1.05		− 31.1	−10.8		8.20914	+584
22	1.8	0.2	+ 1.98	0.63	−0.42	− 41.9	5.4	+5.4	21498	672
23	1.8	0.2	+ 2.61	+0.03	0.60	− 47.3	− 1.5	3.9	22170	714
24	1.8	0.2	+ 2.64	−0.66	0.69	− 48.8	+ 1.3	2.8	22884	696
25	1.8	0.2	+ 1.98	1.38	0.72	− 47.5	3.2	1.9	23580	611
26	1.9	0.2	+ 0.60	2.07	0.69	− 44.3	5.9	2.7	24191	466
27	1.9	0.2	− 1.47	2.60	0.53	− 38.4	10.5	4.6	24657	273
28	2.0	0.2	− 4.07	2.88	−0.28	− 27.9	18.0	7.5	24930	+ 54
29	2.1	0.1	− 6.95	2.76	+0.12	− 9.9	27.3	9.3	24984	−156
30	2.2	0.1	− 9.71	2.16	0.60	+ 17.4	35.7	8.4	24828	341
Oct. 1	2.3	0.1	−11.87	1.18	0.98	+ 53.1	40.7	+5.0	24487	465
2	2.4	0.1	−13.05	−0.07	1.11	+ 93.8	39.8	−0.9	24022	541
3	2.4	0.1	−13.12	+0.75	+0.82	+133.6	+33.7	−6.1	23481	−564
4	2.5	0.1	−12.37			+167.3			22917	
Oct. 20	−1.7	−0.1	+ 2.79	+0.70		− 46.4	− 0.4		8.21341	+662
21	1.6	0.0	+ 3.49	+0.07	−0.63	− 46.8	+ 3.4	+3.8	22003	733
22	1.6	0.0	+ 3.56	−0.65	0.72	− 43.4	5.8	2.4	22736	756
23	1.7	0.0	+ 2.91	1.43	0.78	− 37.6	7.2	1.4	23492	711
24	1.7	0.0	+ 1.48	2.19	0.76	− 30.4	9.2	2.0	24203	597
25	1.8	0.0	− 0.71	2.82	0.63	− 21.2	13.2	4.0	24800	410
26	1.8	0.0	− 3.53	3.17	−0.35	− 8.0	20.7	7.5	25210	+171
27	1.9	0.0	− 6.70	3.03	+0.14	+ 12.7	29.8	9.1	25381	− 87
28	2.0	0.0	− 9.73	2.33	0.70	+ 42.5	38.0	8.2	25294	−329
29	2.0	0.0	−12.06		+1.15	+ 80.5		+3.4	24965	

Krater im Meridian.

Datum		Physische Libration in selenoc. Länge	Breite	Reduction für Meridianbeobachtungen in AR. $\alpha_☾ - \alpha_k$	Diff.		in Decl. $\delta_☾ - \delta_k$	Diff.		Parallaxe lg. sin p_k	Diff.
		′	′	s	s	s	″	″	″		
Oct.	29	—2.0	0.0	—12.06	—1.18	+1.15	+ 80.5	+41.4	+ 3.4	8.24965	—521
	30	2.1	0.0	—13.24	+0.01	1.19	+121.9	38.4	— 3.0	24444	645
	31	2.2	0.0	—13.23	0.87	0.86	+160.3	29.8	8.6	23799	699
Nov.	1	2.2	0.0	—12.36	1.26	0.39	+190.1	18.5	11.3	23100	691
	2	2.2	0.0	—11.10	+1.41	+0.15	+208.6	+ 5.8	—12.7	22409	—639
	3	2.2	0.0	— 9.69			+214.4			21770	
Nov.	18	—1.1	+0.1	+ 3.50	+0.10	—0.65	— 44.7	+ 7.5	+ 2.2	8.21814	+649
	19	1.0	0.1	+ 3.60	—0.55	0.71	— 37.2	9.7	1.8	22463	716
	20	1.0	0.1	+ 3.05	1.26	0.71	— 27.5	11.5	1.7	23179	707
	21	1.1	0.1	+ 1.79	1.97	0.62	— 16.0	13.2	3.7	23886	644
	22	1.1	0.1	— 0.18	2.59	—0.35	— 2.8	16.9	5.9	24530	510
	23	1.2	0.1	— 2.77	2.94	+0.10	+ 14.1	22.8	8.0	25040	309
	24	1.2	0.1	— 5.71	2.84	0.64	+ 36.9	30.8	6.7	25349	+ 59
	25	1.3	0.1	— 8.55	2.20	1.04	+ 67.7	37.5	+ 1.6	25408	—206
	26	1.4	0.1	—10.75	1.16	1.02	+105.2	39.1	— 4.6	25202	441
	27	1.4	0.1	—11.91	—0.14	0.74	+144.3	34.5	9.5	24761	622
	28	1.4	0.1	—12.05	+0.60	0.36	+178.8	25.0	12.1	24139	727
	29	1.4	0.1	—11.45	0.96	+0.06	+203.8	12.9	11.5	23412	759
	30	1.5	0.1	—10.49	1.02	—0.11	+216.7	+ 1.4	10.4	22653	727
Dec.	1	1.4	0.1	— 9.47	0.91	—0.16	+218.1	— 9.0	— 8.6	21926	648
	2	1.4	0.1	— 8.56	+0.75		+209.1	—17.6		21278	—542
	3	1.5	0.2	— 7.81			+191.5			20736	
Dec.	18	—0.1	+0.2	+ 2.01	—1.12	—0.52	— 19.2	+15.0	+ 2.4	8.22919	+584
	19	0.1	0.2	+ 0.89	1.64	0.46	— 4.2	17.4	3.3	23503	559
	20	0.2	0.2	— 0.75	2.10	—0.17	+ 13.2	20.7	5.0	24062	482
	21	0.2	0.2	— 2.85	2.27	+0.10	+ 33.9	25.7	5.4	24544	348
	22	0.3	0.2	— 5.12	2.17	0.52	+ 59.6	31.1	+ 3.6	24892	+162
	23	0.3	0.2	— 7.29	1.65	0.75	+ 90.7	34.7	— 0.4	25054	— 63
	24	0.4	0.2	— 8.94	0.90	0.72	+125.4	34.3	6.0	24991	292
	25	0.4	0.3	— 9.84	—0.18	0.48	+159.7	28.3	9.0	24699	490
	26	0.4	0.3	—10.02	+0.30	0.22	+188.0	19.3	11.7	24209	637
	27	0.4	0.3	— 9.72	0.52	+0.03	+207.3	+ 7.6	11.1	23572	714
	28	0.4	0.3	— 9.20	0.55	—0.06	+214.9	— 3.5	9.8	22858	725
	29	0.4	0.3	— 8.65	0.49	—0.07	+211.4	13.3	— 7.9	22133	677
	30	0.3	0.3	— 8.16	+0.42		+198.1	—21.2		21456	—585
	31	0.2	0.3	— 7.74			+176.9			20871	

A. W. Schade's Buchdruckerei in Berlin S., Stallschreiberstr. 45/46.